Appendix F **Hearing Record** Public Hearing on Proposed Increase in Interbasin **Transfer**

July 13, 2000

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Summary of Public Comments

TABLE F-1
Public Comment Summary

Name/Organization	Date of Comment Submittal			Summary of Comments	Section of
				(letters attached)	Response Summary Where Comments are Addressed
Mick Noland, Chief Operating Officer for City of Fayetteville Public Works Commission	Statement at public hearing: 2000	July 13,	-	IBT amount assumes construction of a proposed regional wastewater treatment plant with discharge to the Cape Fear River	III.A
			-	The alternative to purchase water from Raleigh should be reevaluated	II.A
			-	The model does not simulate the low flow conditions experienced in 1998	I.A
			-	The Jordan Lake water quality pool is insufficient for downstream water quality needs	I.B
			-	The current safe yield estimate of 100 mgd from Jordan Lake is questionable	I.C
			-	EIS needs to provide information on whether the cumulative impacts of all water withdrawals and transfers are acceptable	I.D
			-	EIS should be evaluated objectively without consideration of construction already underway on water treatment plant	IV.F
John Malzone, Cumberland County Chamber of Commerce	Statement at public hearing:	July 13, 2000	-	IBT may inhibit growth in the Fayetteville region	I. M
Elton Hendricks, President of Methodist College	Statement at public hearing:	July 13, 2000	-	If aggressive conservation was used as an assumption in the IBT, there may be significant direct impacts	III.B
			-	Triangle should put the water back in the Cape Fear River after they use it.	I.E, IM, II.B
Senator Anthony E Rand, 24 th District	Letter dated:	July 13, 2000	-	Triangle communities should put water back in Cape Fear River after they remove it	I.E, I.M, II.B
Lura S. Tally, former member of North Carolina Senate	Letter dated:	July 7, 2000	-	If Triangle communities do not replace water they remove from Cape Fear, they will cause problems downstream	I.E, I.H
Rollin S. Shaw, City Council Member, Fayetteville and Dr. Frank S. Shaw	Correspondence dated:	July 30, 2000	-	Cary should return water it removes from the Cape Fear	I.E, I.M, II.B

TABLE F-1
Public Comment Summary

Name/Organization	Date of Comment Submittal			Summary of Comments	Section of Response Summary Where Comments are Addressed	
				(letters attached)		
David Brook, Deputy State Historic Preservation Officer, NC Department of Cultural Resources	Memorandum dated:	July 3, 2000	-	IBT will not impact property eligible for listing in National Register of Historic Places	N/A	
Rick Givens, Chairman, Chatham County Board of Commissioners	Letter dated:	July 18, 2000	-	Downstream users need assurance that there will be adequate water supply and adequate water quality	I.B, I.E, I.H	
Larry B. Thomas, Director of Public Works, City of Sanford	Letter dated:	July 20, 2000	-	Transfer of water will have negative environmental impact on Cape Fear River Basin. Each transfer should not be reviewed individually.	I.B, I.D, I.E	
			-	Transfer of water will have negative economic impact on Cape Fear River Basin	I.B, I.C, I.E	
Mick Noland, Chief Operating Officer of Water Resources Division, Public Works Commission, City of Fayetteville	Letter dated:	July 27, 2000 *	-	Future agricultural water withdrawals should be described.	I.J	
			-	Randleman Lake should be simulated in the model	I.K	
			-	A modeling scenario should be included that compares the proposed alternative, with only current and recommended Jordan Lake allocations, to the Base 1998 case.	I.L	
Hugh T. Caldwell, Director of Public Utilities, City of Wilmington	Letter dated:	July 27, 2000	-	The proposed IBT may impact downstream water quality and assimilative capacity	I.E, I.H	
			-	The EIS did not consider the affects of Durham obtaining an allocation from Jordan Lake	I.O	
Rodney Tart, Director, Harnett County Department of Public Utilities	Letter dated:	July 31, 2000	-	EIS indicates there will be minimal impact on downstream water supply at Lillington and does not object to the IBT. However, as growth continues, water resources will become more limited. Therefore, plans should begin to return water to the Cape Fear	II.B	
			-	Support DWR's efforts to develop a comprehensive model of future Cape Fear River use	IV.G	
Hal Broadfoot, citizen of Fayetteville	Correspondence dated:	July 13, 2000	-	Triangle financing its growth by using water resources that belong to downstream users	I.G	

TABLE F-1
Public Comment Summary

Name/Organization	Date of Comment Submittal			Summary of Comments	Section of
				(letters attached)	Response Summary Where Comments are Addressed
			-	Fayetteville, unlike upstream neighbors, have invested in state-of-the-art water and wastewater treatment	IV.D
Reid Gannt, citizen of Fayetteville	Correspondence dated:	July 13, 2000	-	Allowing this interbasin transfer will be disastrous for Cape Fear River	I.E, I.H
Marie Tinnin Stewart, citizen of Fayetteville	Correspondence dated:	July 13, 2000	-	Build a treatment plant that will correct the interbasin transfer prior to withdrawing more water from Jordan Lake	II.B
Scott M. Bigelow, citizen of Lumberton	Correspondence dated:	July 13, 2000	-	What conservation measures are being undertaken in Triangle?	II.C
			-	Build a new WWTP that discharges to the Cape Fear	II.B
			-	Look at 100 year drought; in drought impacts of pollution are amplified	I.D
			-	Did study account for pollution in Cape Fear?	I.H
			-	Good planning would dictate that state grow in areas where there are resources to support the growth	IV.A
			-	Legislature should fund study to ensure that North Carolina will not experience the water problems of the west	IV.B
			-	Use supply and demand to dictate who gets water	IV.E
			-	Make the IBT certificate temporary. If water quality in the Cape Fear declines, revoke or cut back the transfer	1.1
			-	Hold hearing downstream in Cape Fear and not in Cary	I.N
			-	Triangle does not need water	IV.C
Colonel W. S. Crumlish, USA Retired, Corps of Engineers	Letter dated:	July 11, 2000	-	Water should remain in Cape Fear Basin	I.E
Walter D. Dietrich, citizen of Fayetteville	Letter dated:	July 16, 2000	-	State has underestimated the drinking water capacity of Jordan Lake	I.C
			-	Interbasin transfer should not be allowed; plant that will return water to Cape Fear River should be built first	II.B
James and Jenny Rosser, citizens	Correspondence dated:	July 30, 2000		Apex should return water it removes from the Cape Fear	II.B

TABLE F-1Public Comment Summary

Name/Organization	Date of Comment Submittal		Summary of Comments (letters attached)		Section of Response Summary Where Comments are Addressed
of Fayetteville					
Maryann and Bob McCoy, citizens of Fayetteville	Correspondence dated:	July 30, 2000	-	Cary should return water it removes from the Cape Fear	II.B
D. R. Himocks, Jr., citizen of Fayetteville	Correspondence dated:	July 31, 2000	-	Towns that remove water from the Cape Fear should return it to avoid situation similar to Colorado River	II.B, IV.B

^{*} Many of the comments submitted in this letter were identical to the oral statement provided on July 13, 2000 at the public hearing. Only those comments that were not included in the July 13, 2000 statement are summarized in this table.

SUMMARY OF PUBLIC COMMENTS

Environmental Impact Statement for RTP South and the Towns of Cary, Apex, and Morrisville in Wake County for the Increase in Interbasin Transfer from the Haw River Subbasin to the Neuse River Basin

I. Impacts on Downstream Uses

A. The base 1998 modeling scenario is supposed to represent existing basin conditions in 1998 and is used as a baseline to compare alternatives. The model did not accurately predict the low flows in 1998.

The model cannot accurately predict the low flows in 1998 because of the way Jordan Lake releases were managed. The model was developed based on the Army Corps of Engineers rules and guidelines for releasing water. The model cannot take into account human subjectivity in releasing water. In 1998, the Corps released higher amounts of water in the spring, only to realize in the fall that the water quality pool was almost depleted. The Corps then worked with the Division of Water Resources and the Division of Water Quality to ratchet back the minimum releases to ensure that the water quality pool was not depleted while downstream water quality conditions were maintained. Monitoring indicated that this did not impact downstream uses.

The Base 1998 scenario was not meant to mimic observed daily flows during specific time periods such as 1998, but to provide a baseline, under current conditions (including the guide curve), for comparison of hydrologic indicators among different scenarios. The model scenarios presented in the EIS accurately portray the relative differences in hydrologic indicators that are expected between proposed and current conditions. While the absolute flows would change if the model could be used to mimic 1998 low flows, the relative difference between current and proposed conditions would not change significantly.

B. The Jordan Lake water quality pool is insufficient for downstream uses; in the past, the 600-cfs target at Lillington has frequently not been met.

The model shows that the IBT will not reduce the amount of downstream flow that can be maintained. This is because the Lake's water quality pool, the full amount of which is reserved only for insuring downstream flow, is managed separately from the water supply pool. This means that water withdrawn for the IBT will not reduce the amount available to ensure downstream flow. Therefore, the IBT cannot affect downstream flow, so there is no impact to be addressed in the EIS. Furthermore, failure to always meet the 600-cfs target does not necessarily mean that the water quality pool is insufficient for downstream uses. The 600-cfs flow target at Lillington was set based on some assumptions regarding the adequacy of the water quality pool, without the benefits of a detailed analysis using a tool such as DWR's Cape Fear River Basin ("CFRB") Hydrologic Model, and therefore it is a somewhat arbitrary target.

Even though it is clear that the downstream flow would not be affected by the IBT, the applicants realize this is obviously an important issue to downstream entities. Thus, the model was used to examine the impact the proposed IBT would have on the frequency that the flow target of 600-cfs at Lillington can be met. This modeling effort, which is presented in the EIS, clearly shows that the ability to achieve the 600-cfs target is uninfluenced, or even mildly enhanced, by the proposed IBT. Table 12 and Appendix B shows the target would be met (on a daily basis for the sixty-nine year modeling period) 65% of the time under Base Future

conditions, and 65.1% under proposed conditions. The target would be met 65.7% of the time under Base 1998 conditions, and 65.9% of the time under the newly modeled "Proposed Incremental A" scenario (discussed under item I.L. below)

C. The safe yield of Jordan Lake may have been overestimated.

The Division of Water Resources feels that the modeling completed to date supports the use of 100 mgd as a good estimate of the safe yield of the Jordan Lake water supply pool. In addition, DWR is planning to work with the COE in evaluating and updating the drought management plan for the project. The drought management plan will influence the return period for this yield. The issue of safe yield will be evaluated during Round 3 of the Jordan Lake water supply allocation process with the CFRB Hydrologic Model. It should be noted that the Jordan Lake water supply allocations are actually allocations of a storage volume, not a withdrawal amount. Therefore, while average annual withdrawal rates are used in discussing the allocations, the withdrawal of each allocation holder will ultimately be limited to the volume of water in their separately-tracked portion of the water supply pool. If the water supply pool is depleted there will be no withdrawals and therefore cannot impact the water quality pool. Again, the purpose of this EIS was to evaluate the impacts of the proposed action under the current guide curve and operational practices of Jordan Lake.

D. The EIS needs to provide information on whether the cumulative impacts of all water withdrawals and transfers are acceptable.

The EIS does examine the cumulative impacts of future water withdrawals and discharges in Appendix B. The EIS indicates that low flows will actually increase when the proposed interbasin transfer is modeled along with estimated future withdrawals and discharges throughout the Cape Fear River Basin. This is because wastewater discharges will increase streamflow, especially downstream of reservoirs, during low flow periods. The following table excerpted from the EIS (Appendix B, section 5.2) illustrates this point:

Scenario	Lillington			Fayetteville			
	7Q10	30Q20	30Q50	7Q10	30Q20	30Q50	
Base Future	183	260	160	446	458	335	
Proposed Cumulative	357	368	271	511	521	420	
Alt. 1A Cumulative*	331	346	243	496	499	391	

Note: all values in cfs.

Appendix B, Table 12, in the EIS shows that flows at Lillington should exceed the target of 600 cfs as follows (based on daily flows over the 69-year study period):

BaseFuture: 64.5 percent of the time

Alternative 1A Cumulative (no increase in IBT): 65.5 percent of the time

Proposed Cumulative: 66.1 percent of the time

Therefore, the cumulative effect of increased withdrawals and discharges in the Cape Fear River

^{*} Alternative 1A is no increase in interbasin transfer or increase in withdrawal from Jordan for Cary, Apex, Morrisville, and RTP

basin above Lillington is to slightly increase flows at Lillington and other points downstream of Jordan Lake.

E. If Triangle communities do not replace water they remove from the Cape Fear River, they will cause problems downstream.

The only mechanism for the proposed IBT to cause problems downstream is if it resulted in substantially lower flows in the Cape Fear River. Modeling that was performed to evaluate the different alternatives indicates that there is negligible difference in expected downstream flows when comparing the proposed interbasin transfer to the base future case. The modeling results are summarized in Appendix B of the EIS. Cary and other towns in the Triangle are planning to replace a portion of the water withdrawn from Jordan Lake, and are working toward building a proposed regional water reclamation facility that will discharge wastewater to the Cape Fear River Basin.

F. The proposed IBT will have minimal impact on the flow at Lillington. However water resources will become more limited in the Cape Fear River, and in the long term, it will be prudent to plan to return water that is removed from the river basin.

Cary and other towns in the Triangle are working toward building a proposed regional water reclamation facility that will discharge wastewater to the Cape Fear River Basin.

G. The Triangle is financing its growth by using water resources that belong to downstream users.

Water is not a commodity that belongs to any one area or community in the state. Rather, it is everyone's responsibility to ensure its protection from both a quantity and quality standpoint. The EIS and IBT certification processes are designed to ensure that the needs of potential users and impacts of the proposed action are adequately considered.

H. The study did not account for pollution in the Cape Fear River and the need for flow to assimilate wastewater.

The only mechanism for the interbasin transfer to impact water quality and the ability of the river to assimilate wastewater would be if it resulted in substantially lower flows in the Cape Fear River. The modeling results indicate that, with the proposed IBT, flows near Lillington and Fayetteville will remain basically unchanged from the base future condition, in which the Jordan water supply pool is allocated according to the current plan. The water that is transferred under the proposed interbasin transfer is associated with withdrawal of water from Jordan Lake's water supply pool, and will not impact the water quality pool which is used for low flow augmentation as explained in I.B. Inflows to and releases from the water quality pool are managed separately from the water supply pool.

I. The Interbasin Transfer certificate should be temporary. If water quality declines in the Cape Fear River, the certificate can be revoked or cut back.

The only mechanism for the interbasin transfer to impact water quality would be if it resulted in substantially lower flows in the Cape Fear River. The modeling results indicate that, with the proposed IBT, flows near Lillington and Fayetteville will remain basically unchanged from the base future condition, in which the Jordan water supply pool is allocated according to the current plan. Therefore, there are no changes expected in water quality as a result of the

proposed interbasin transfer.

J. Future agricultural withdrawals should be described.

Irrigation water for agricultural use was included in the modeling scenarios. Available evidence indicates that agricultural use is more likely to decrease than increase in the future. The consultants who developed the hydrologic model suggested that while total agricultural acreage will probably decrease in the future, some newer crops may use more water, so the total agricultural use may not change significantly. Therefore, to be conservative, future agricultural withdrawals were assumed, based on guidance from the Division of Water Resources, to be identical to the withdrawals made in 1998. The consultants' expert advised that future needs for agricultural use should not be based on past trends, and that assuming the total needs remain constant is a reasonable approach. Using 1998 irrigation statistics should be fairly conservative as it was a low flow year.

K. Randleman Lake should have been included in the model runs.

Omitting Randleman Lake from the model runs is a conservative assumption. Randleman Lake was omitted from the model runs based on guidance from the Division of Water Resources. DWR has indicated that this is conservative as including Randleman results in increased flows in the Deep River since there will be a minimum release from Randleman Dam. In addition, Randleman Lake will result in flow into the Haw River subbasin from the Deep River subbasin, thereby increasing the Haw River flows.

L. A modeling scenario should be included for comparison to the Base 1998 case that represents the proposed alternative with only the existing and recommended Jordan Lake allocations.

An additional model scenario ("Proposed Incremental A") has been developed. The following table shows the resulting low flow statistics for this "Proposed Incremental A" scenario as compared to the Base 1998 scenario.

Scenario 7Q10 at Lillington (cfs)		7Q10 at Fayetteville (cfs)
Base 1998	132.6	406.2
Proposed Incremental A	205.0	462.6

Under the Proposed Incremental A scenario, flows at Lillington exceed the 600-cfs target 65.9 percent of the time, compared to 65.7 percent of the time under the Base 1998 scenario. Table 12 from Appendix B has been updated to include this new modeling run as shown below.

M. The proposed IBT may inhibit growth in the Fayetteville region.

The only mechanism for the interbasin transfer to impact growth in Fayetteville would be if it resulted in substantially lower flows in the Cape Fear River. As shown above, the proposed IBT will have an insignificant impact on the flow downstream of Jordan Dam compared to current conditions.

TABLE 12Comparison of Hydrologic Impacts of EIS Alternatives

Scenario	Description	Jordan Lake Outflow < 100 cfs	Jordan Lake Level < 210 ft. MSL	Water Quality Pool < 20%	Flows at Lillington < 600 cfs	Flows at Fayetteville < 600 cfs
Base 1998	Existing Conditions	12.6%	4.9%	4.2%	34.3%	2.0%
Base Future	Existing, plus Jordan Withdrawals = 100 mgd	15.2%	8.7%	3.8%	35.5%	1.9%
Alternatives for Increment	tal Impacts Evaluation					
Proposed Incremental	Requested IBT Increase	16.0%	8.6%	3.5%	34.9%	1.8%
Proposed Incremental A	Requested IBT with only existing and recommended Jordan allocations	14.0%	5.9%	4.0%	34.1%	2.0%
Alt. 1A	No IBT Increase and No Additional Allocation	15.2%	8.7%	3.8%	35.5%	1.9%
Alt. 1B	Additional Allocation with No IBT Increase	15.9%	8.4%	3.4%	34.8%	1.8%
Alt. 2	Obtain Water from Neuse Basin	15.9%	8.4%	3.4%	34.8%	1.8%
Alt. 3	Relocate Existing WWTP Discharges to Cape Fear	16.2%	8.3%	3.4%	34.5%	1.8%
Alt. 4	Merger with Durham	16.0%	8.6%	3.5%	34.9%	1.8%
Alt. 5	No Regional WWTP (IBT = 54 mgd)	15.8%	9.2%	4.1%	35.7%	2.0%
Alt. 6	No Regional WWTP; Jordan withdrawal = 20 mgd (IBT = 27 mgd)	15.4%	8.9%	3.9%	35.6%	1.9%
Alternatives for Cumulativ	ve Impacts Evaluation					
Proposed Cumulative	Requested IBT Increase	13.7%	6.2%	2.6%	33.9%	1.8%
Alt. 1A Cumulative	No IBT Increase and No Additional Allocation	13.0%	6.3%	2.7%	34.5%	1.9%

N. Future hearings should be held in a downstream community and not Cary.

Comment noted.

O. Durham's application for an allocation from Jordan Lake that will result in a net loss to the Cape Fear Basin by correcting an existing IBT from the Neuse was not considered in the EIS.

Durham's allocation request from Jordan Lake was denied and was thus not examined individually. However, all model scenarios, other than the new "Proposed Incremental A" scenario, were based on the assumption that the remainder of the water supply pool was allocated to unknown users, which could potentially include Durham. It was also assumed that fifty percent of the remaining allocated amount was returned to the Cape Fear River basin. Durham's future projected wastewater was also included in the base future scenarios.

II. Alternatives

A. The alternative to purchase water from Raleigh should be reevaluated. The adopted Wake County Water & Sewer Master Plan includes a recommendation that Raleigh's water treatment plant capacity be expanded to 96 mgd by 2003, to 120 mgd by 2011, and to 136 mgd by 2025. Raleigh recently adopted a Capital Improvement Program that allocates \$54 million for expanding Raleigh's water treatment capacity.

Raleigh has indicated that they will not sell Cary more water, for either the short or long term. While the Wake County Water and Sewer Master Plan recommended major expansions of Raleigh's water supply system, the expanded capacity was targeted to serve only the eastern portions of Wake County. The Plan also recommended that withdrawals from Jordan Lake be expanded to 38.4 mgd (average annual) to meet long-term needs from western Wake County communities.

B. The Triangle Communities should build a wastewater treatment facility that will correct the interbasin transfer of water before they withdraw more water from Jordan Lake.

Cary and other towns in the Triangle are working toward building a proposed regional water reclamation facility that will discharge wastewater to the Cape Fear River Basin.

C. What conservation efforts are ongoing in the Triangle? Conservation should be used prior to interbasin transfer.

Conservation efforts are outlined in section 6.2.3.4 of the EIS. The western Wake communities requesting the IBT certificate have water conservation programs, and the water use associated with the requested IBT amount is based on aggressive conservation efforts and assumes a per capita water demand rate for Cary and Apex that is considerably lower than the per capita demand rate generically assumed for the rest of Wake County. The following table shows projected per capita water demands used to develop the 2030 water needs in the EIS for Cary and Apex in comparison to average demands developed for Wake County communities for the Water and Sewer plan.

Community	2030 Average per capita demand (gpcd)
Cary	82
Apex	88
Wake Co Water and Sewer Plan	130

III. Interbasin Transfer Calculation

A. The interbasin transfer calculation assumes construction of a proposed regional wastewater treatment plant with discharge to the Cape Fear River. This assumption should not be made as the treatment plant is not guaranteed.

The interbasin transfer request is based on the assumption that a new WWTP will be built that discharges to the Cape Fear River Basin. Without a discharge returning water to the Cape Fear River basin, the 27 mgd IBT will only support average day withdrawals from Jordan Lake of about 20 mgd which would only satisfy the applicants projected needs until 2007. To meet higher demands, Cary would have to limit growth or pursue one of the other alternatives presented in the EIS.

An additional modeling scenario (Alternative 6) was investigated that included average annual Jordan Lake withdrawals of 20 mgd and no return to the Cape Fear River, which would result an IBT equal to the requested 27-mgd amount. Under this scenario, the 600-cfs target at Lillington would be exceeded 64.4 percent of the time, compared to 64.5 percent under the Base Future scenario. This indicates that even if the proposed WWTP is not built, the impact of a 27-mgd IBT on downstream flows in the Cape Fear River would be insignificant. The updated Table 12 from Appendix B of the EIS shown above contains the results of this additional model run.

The communities have agreed to request an IBT assuming that wastewater is returned to the Cape Fear River basin within a very short time frame. The purpose for including this assumption in the IBT calculations and the proposed request was to demonstrate the communities' commitment to returning water to the Cape Fear River Basin.

B. Aggressive conservation was assumed in the IBT calculations. If this conservation does not occur, there may be significant impacts on downstream uses.

The amount of the interbasin transfer request is based on aggressive conservation in the Triangle communities. If this conservation does not occur, the communities will reach the limit of the IBT sooner, and there is no mechanism to exceed that amount. Then the communities will need to pursue other alternatives to supply water to their citizens for the 30-year planning time frame. If the request is approved, Cary would not be able to exceed the approved IBT amount and so impacts would not differ from those presented in the EIS.

IV. Miscellaneous Comments

A. Good planning would dictate that the state grow in areas where there are resources to support the growth.

One of the purposes of Jordan Lake is to supply water. Consequently, the reservoir was built with a reserved water supply pool. Another purpose of the reservoir is flow augmentation downstream to protect water quality. To meet this use, a separate pool of water exists that cannot be withdrawn for water supply purposes. The yield analysis and allocation rules for Jordan Lake's water supply pool recognize that some of the water supply will not be returned.

B. The legislature should fund a study to ensure that North Carolina will not experience the water issues that the west is struggling with.

Comment noted.

C. The Triangle does not need water.

The need for water was presented in Section 2 of the EIS.

D. Fayetteville has invested in state-of-the-art water and wastewater treatment, and the Triangle communities should do so as well.

The Triangle communities have also installed state-of-the-art wastewater treatment and have limits equivalent or more stringent than those for communities downstream of Jordan Lake – often including additional requirements for nutrient removal.

E. The free market method of supply and demand should be used to determine who gets water. Communities and entities that offer the highest price should get the water.

Comment noted.

F. The EIS should be evaluated objectively without consideration of construction already underway on water treatment plant.

Comment noted.

G. As North Carolina continues to grow, water resources in the Cape Fear River Basin will become more limited. The Division of Water Resources should continue to develop a comprehensive model of future Cape Fear River use.

Comment noted.

Part B
Public Hearing Oral Comments
July 13, 2000

[Letter from Senator Anthony E. Rand read into record by Hearing Officer]

NORTH CAROLINA GENERAL ASSEMBLY Senator Anthony E. Rand, 24th District

Room 300 C Legislative Office Building Raleigh, NC 27601-2808 1919/733-9892 1919/733-3113 Fax tonyr@ms.nega.state.ne.us July 13, 2000

Chairman, Rules and Operations of the Senate Chairman, Employee Hospital and Medical Benefits Vice Chairman, Appropriations/Base Budget Vice Chairman, Information Technology

TO BE READ AT THE HEARING THIS EVENING CARY TOWN HALL, 5:00 – 7:00 P.M.

Mr. Tony Young
Hearing Officer
Division of Water Resources
Department of Environment and Natural Resources
Archdale Building
512 North Salisbury Street
Raleigh, North Carolina 27604-1148

Dear Mr. Young

AER:ec

Through my service in the General Assembly and also my service as Chairman of the Cape Fear River Assembly for several years, I have become acutely aware of the problems of water supply and the protection of the Cape Fear River Basin.

The City of Fayetteville has been blessed to be located on the Cape Fear and the founding fathers of our city knew this when they located our city there. Now there are those who would deny us our most valuable resource and take the short term approach to transfer water from our river basin. To allow others to grow at our expense would be shortsighted in the extreme. The City of Fayetteville has voted a significant bond issue in order to return the water it takes from the Cape Fear back to the Cape Fear for further use by those down stream.

We should all be good stewards of our natural resources and should not try to benefit at the expense of the less fortunate. I have no problem with the Triangle using water from the Cape Fear, but I do have significant problems with their failure to return it to where the Lord originally put it.

District on a Physical Experience of August 1986.

I appreciate your attention to this and wish you well in your efforts.

Very truly yours

Anthony E

4.0

[Oral Comments of John Malzone – Cumberland County Chamber of Commerce]

Thank you, my name is John Malzone from Fayetteville and I am here on behalf of the citizens of Fayetteville and Cumberland County. More particularly the Fayetteville/Cumberland County Area Chamber of Commerce.

I am a member of the Chamber of Commerce as well as being a member of the Fayetteville Area Economic Development Commission and I remember back in 1988 when the original 16 million gallons were transferred. There was a discussion in Fayetteville but we were busy with other matters. We didn't complain too much and plus it was our good friends up in Cary, by gosh it was a nice little town up in Cary, we were happy to see them grow. But funny things have happened over these past several years and Cary has grown dramatically as has Fayetteville. But the difference is that we are a low wealth community and consequently we do not have the proximity to the state capital, we don't have the highways, the educational resources. But what we do have is the desire to grow because Fayetteville and Cary are kind of alike. Most everybody from Fayetteville is not from Fayetteville and a lot of people from Cary are not from Cary. But what happens is people gravitate to a certain geographic location and we have similar likes and similar desires, we want our community to grow.

What we understand in Fayetteville is that for us to grow successfully we have to have industrial development. For this we have no problem with Wake County and the Triangle Area using water from the Haw Basin/Cape Fear Basin as long as they return it to that basin so that we downstream can use that water. We cannot grow if water is taken from this basin, deposited into the Neuse Basin never to return. So on behalf of the citizens, the 350,000 people in the Greater Fayetteville/Cumberland County Area we urge you to re-examine this Impact Statement. I serve on the Cape Fear Valley Health Systems Board Trustee, two years as its President and a 600 million dollar a year health system and we find that when we want an issue to go our way, we pay the consultants. So consequently consultants are wonderful, they provide a tremendous amount of information but to say that there is no significant impact downstream, I think is an incorrect interpretation of reality.

Thank you.

[Written text of oral comments of Mick Noland, Chief Operating Officer, Public Works Commission, City of Fayetteville]

STATEMENT BY FAYETTEVILLE PUBLIC WORKS COMMISSION

JULY 13, 2000 PUBLIC HEARING PROPOSED IBT INCREASE FOR RTP SOUTH AND TOWNS OF CARY, APEX AND MORRISVILLE

My name is Mick Noland. I am the Chief Operating Officer for the Water Resources Division of the City of Fayetteville Public Works Commission. This evening I would like to take a few minutes to describe some of our concerns with the proposed interbasin transfer increase for several communities in the Triangle area. I will confine my remarks to specific areas relevant to the May 2000 Draft EIS that is currently under review.

First, we believe that the Proposed Action should be redefined. The Proposed Action assumes that construction of a regional wastewater treatment plant will occur in western Wake County with discharge to the Cape Fear River. However, we know of no reason that this can be assumed as a given. No environmental review has yet been issued for public review of such a project. We do not believe that it is appropriate to now assume that a West Cary wastewater treatment plant or some other similar project will be permitted. A SEPA review process has not even been conducted and potential construction of such a project is envisioned by Cary as being nearly a decade away.

Alternative 5 is defined assuming that the Cary North, Cary South, and Apex wastewater treatment plants may have sufficient permitted capacity to treat projected wastewater flows to 2030. In fact, the recently adopted Wake County Water & Sewer Plan includes a recommendation that the capacities of both the Cary North and Cary South wastewater treatment plants be expanded in the near future.

Given these facts, we request that the Proposed Action be redefined as Alternative 5, which assumes that no regional wastewater treatment plant is constructed in the Cape Fear Basin.

Second, we believe that the alternative of purchasing water from Raleigh should be reevaluated. Alternative 2 includes purchase of finished water from either Durham or Raleigh. The EIS points out that Raleigh has recently denied Cary's request for additional water purchases through 2003. However, Cary has a connection with the City of Raleigh with a capacity of 13 mgd and, as recently as May of this year, Raleigh did agree to sell additional water to Apex and Wendell. In addition, there have been recent reports that Raleigh could still agree to sell additional water to Cary, particularly if the State approves increasing Raleigh's water treatment plant capacity to 80 mgd. The adopted Wake County Water & Sewer Plan even includes a recommendation that Raleigh's water treatment plant capacity be expanded to 96 mgd by 2003, to 120 mgd by 2011, and to 136 mgd by 2025. To back up this recommendation, Raleigh, less than two months ago, adopted a Capital Improvement Program that allocates 54 million dollars for expanding Raleigh's water treatment capacity.

Given these facts, we request that the availability and feasibility of purchasing water from Raleigh be reevaluated in light of adopted plans to greatly expand Raleigh's water treatment capacity.

Third, we do not believe that the EIS scenarios provide a realistic low flow impact assessment for users downstream of Jordan Lake. The Base 1998 scenario is supposed to represent existing basin conditions in 1998. However, Cape Fear River flows at Lillington simulated in the EIS are frequently much higher than actually occurred during the period since Jordan Lake filling was completed in 1982. The fact is that actual Lillington flows have dropped below the 600 cfs minimum flow target every year between 1982 and 2000, often far below 600 cfs, and to levels as low as 300 cfs. In other words, the impact

assessment of downstream flow conditions is theoretical rather than a realistic assessment of what downstream users can expect. The low flow periods where large flow discrepancies exist between actual and simulated levels are the same periods that are critical for evaluating the impact on downstream communities such as Fayetteville.

Given these facts, we request that a realistic evaluation of low flow impacts below Jordan Lake be developed for the EIS.

Fourth, we believe that the EIS scenarios demonstrate that the Jordan Lake water quality pool is already insufficient for downstream needs. Even under the Base 1998 scenario, simulated Jordan Lake water quality storage is fully depleted so frequently that it is clear that the water quality pool is too small to maintain the 600 cfs minimum flow target at Lillington. This demonstrates a critical problem in how current Jordan Lake storage is currently managed. We believe that it would make more sense to first ensure that adequate storage can be apportioned to maintain downstream flow needs before allocating additional water supply storage. Otherwise, downstream users such as Fayetteville, who depend on Jordan Lake water quality storage to maintain the minimum flow target, can already expect insufficient Cape Fear flows during drought. This expectation is confirmed in the Base 1998 scenario results from the EIS showing Lillington flows dropping down to about 100 cfs or less during one out of every seven years. The EIS claims that the Proposed Action will not affect downstream users' supplies or assimilative capacities. However, the EIS misses the point that the data show that there is already a problem with the water quality pool maintaining an adequate low flow regime.

Given these facts, we question the logic of approving new allocations when, even under existing conditions, downstream users already face such critical supply uncertainties. Fifth, we believe that the EIS scenarios demonstrate that the current Jordan Lake water supply safe yield estimate is questionable. The Proposed Incremental scenario assumes that total Jordan Lake withdrawals equal 100 mgd. Under this scenario, simulated Jordan Lake water supply storage is fully depleted in 1933, 1934, 1953 and 1954 and nearly depleted in 1986. We question the legitimacy of the 100 mgd safe yield estimate for Jordan Lake when these EIS results show water supply storage being fully depleted in multiple droughts and fully depleted or at less than 5 percent for over three consecutive months in one drought. At the very least, these results demonstrate that the 100 mgd estimate may be optimistically high. This is even before considering the potential safe yield reduction if the "50 Percent Rule" were modified to allow a greater than 50 percent diversion of the water supply pool out of Jordan Lake's watershed.

Given these facts, we question the prudence of approving new allocations when this level of uncertainty exists with this most basic assumption of available safe yield for allocation.

Sixth, we do not believe that the acceptability of cumulative impacts has been assessed. The EIS does include scenarios in which the complete Jordan Lake water supply pool is utilized. However, the real question, of whether the cumulative impacts are acceptable or not, is not addressed in the EIS.

Lastly, we wish to emphasize that an objective evaluation of the EIS is needed regardless of the construction already underway to make use of the proposed allocation. Cary/Apex water supply system improvements are already well underway that would allow withdrawal and treatment of an expanded Jordan Lake allocation. These improvements include expansion of the water treatment plant, expansion of the raw water pump station, and construction of a raw water transmission line. Millions of dollars have already been spent on this

construction which began last year in October. These improvements have been made without EMC approvals and constitute a sizable risk

Given these facts, it's critical that the EIS be objectively evaluated even though millions of dollars have already been spent on construction.

In closing, let me just add that we now have the opportunity to take a positive step toward ensuring that the Cape Fear River remains available for the present and future generations who will have to rely on this resource. The serious warning signs that already exist in this basin should cause all of us to stop and make sure that these issues are addressed now, while the opportunity still exists, and before irreversible actions are taken. We merely need to look at the water quality issues in the adjacent Neuse River Basin to see how serious problems can easily overtake us if we don't take full account of the warning signs. A more pro-active approach to management of our basin would ultimately be in everyone's best interests rather than allowing expediency to govern our actions.

Thank you for the opportunity to express the views of the City of Fayetteville Public Works Commission. We respectfully ask that each of our concerns be satisfactorily addressed before any final decisions are made concerning the requested IBT.

Respectfully submitted by:

M. Moland, P.E.

Chief Operating Officer

Water Resources Division

City of Fayetteville Public Works Commission

[Oral comments of Mr. Elton Hendricks, President of Methodist College, Fayetteville, NC]

Ladies and Gentlemen, I appreciate the opportunity to speak with you briefly on a very important topic.

My name is Elton Hendricks; I am the President of Methodist College in Fayetteville. We are in the northern part of the City of Fayetteville; our campus is aligned or situated along the Cape Fear River. We have approximately 1-mile footage along the Cape Fear so it is the river I have a privilege of looking at regularly and happy to see it flow along happily and constantly.

I am concerned that the IBT threatens the water source of the City of Fayetteville. It threatens the future economic development of an area that needs economic development, and the IBT threatened the quality of life in the Cumberland County/City of Fayetteville area. I am not convinced from what I've known earlier or what I have heard today that the environmental questions surrounding the IBT have been adequately addressed. For example, the Executive Summary reads in part that the EIS includes Direct Impacts of the IBT would be insignificant and yet we've heard here today the acknowledgement that assessments about reduced use and conservation were very aggressive assumption with regard to IBT. Then the assumption, the environmental impact would be insignificant based on the assumption of additional wastewater treatment plants to return water to the Cape Fear Region. Those are at least in the present environment far from certain and do not justify confidence that the EIS would be valid. It is instructive to remember what we were told by the tobacco industry for a long period of time that there were really no questions of health regarding the tobacco industry. Those in fact are not the case.

There is obviously a need and desire that the growth of the Research Triangle Area to continue for the use of water but a simple conclusion on my part is that if you want to use the water from the Cape Fear Region put it back in the Cape Fear River Basin. One of the basic things we learned in kindergarten was if you used something, you should put it back where you found it. That is true, whether it is a cookie cutter for play dough or whether it is water from the Cape Fear River Basin. If the water is needed it should be used, treated, and placed back into the river from which it came. The river that nature and nature's God placed in that particular location; it is inappropriate to divert water from the Cape Fear Basin for the welfare of rapidly growing areas elsewhere when those who live downstream need that water for their own economic development.

Now there are two objections that I have heard to the question of treatment and replacing of the water in the Cape Fear Basin. One is that the treatment plants are not ready and unlikely to be ready anytime in the near future. The Fayetteville Observer today has a wonderful editorial entitled "Water Heist" justly note to Cape Fear holdup suggest that the current projection of our water treatment plant projected for the year 2003 which itself was a postponement from and earlier date. The editorial raises serious questions if that water treatment plant would be available by that time. But the fact that the water treatment plant, water treatment is not available and the result to that should not be borne by people who live downstream. Those who live downstream should not be required to bare the burden of poor planning upstream. If water is to be taken from the Cape Fear those people who needed should make adequate plans for treating it and returning it to the Cape Fear Basin.

The second argument that I have heard about returning it to the Cape Fear Basin is that it is just too expensive. But my conclusion is that if you need water or need somebody else's water you should be willing to pay for it.

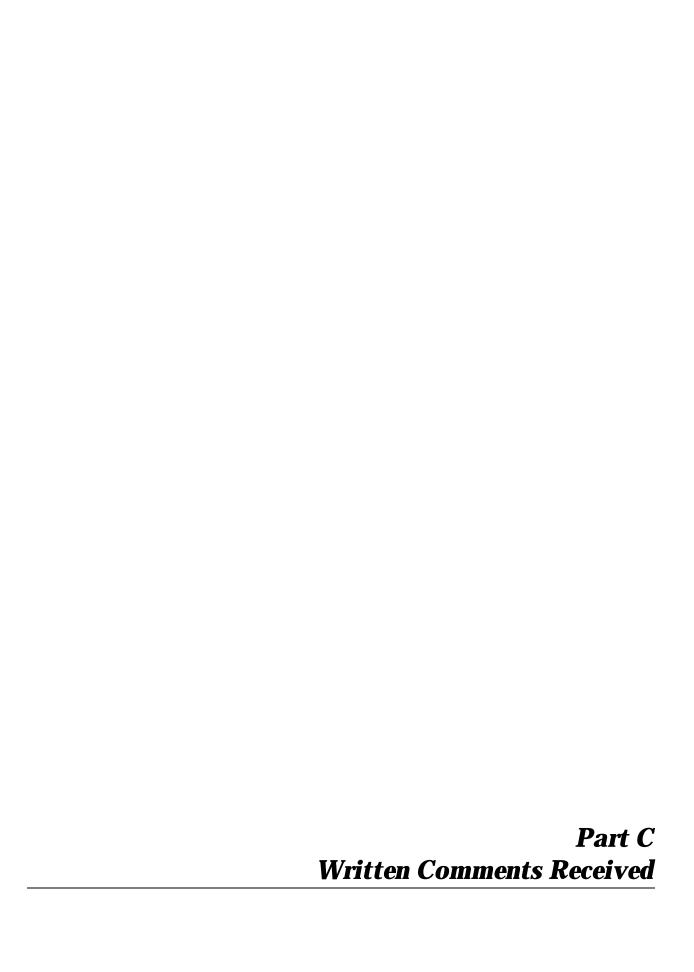
The tax base of the Research Triangle, Wake County, Raleigh, and Cary area is the envy of most communities in the nation, a large tax base. If there is anyone who can afford to pay for water treatment facilities are those people who live in this particular area. It is never just and moral to ask poor counties downstream to bare the burden of rich counties upstream and that's what in fact is being done or being proposed when it is suggested that we have IBT to the benefit of wealthy counties to the detriment of poor counties downstream.

I think the conclusion is simple, if you need the water take it, use it, treat it, and put it back; recognizing that there is some consumptive degradation in the amount of water that is returned. That is understandable. But no water should be taken out of the Cape Fear beyond what has already been taken until adequate preparations are made to return that water. That is the politically responsible, environmentally responsible, and the morally responsible thing to do.

And then one last comment. Those people who would be most damaged by transfer from the Cape Fear Basin to the Neuse Basin, those who would have the most detrimental experience from that activity don't live in the area where this hearing has been held. This hearing ought to be held in the region where the people downstream will experience that and I suggest that any future hearings ought to be held in an area which is convenient to the people who would be most damaged by the transfer.

I appreciate the opportunity to express these views and I have every confidence in the wisdom and the responsibility of the environmental folks in our state that in the end we will do the environmentally, politically, and morally responsible thing to do.

Thank you very much.



[Cover letter from Ms. Chrys Baggett, Environmental Policy Act Coordinator, State Clearinghouse]



North Carolina Department of Administration

James B. Hunt, Jr., Governor

Katie G. Dorsett, Secretary

August 1, 2000

Mr. Mark Broadwell NC Dept of Env & Nat Resources Div of Water Resources 1611 Mail Service Center Raleigh, NC 27699-1611

Dear Mr. Broadwell:

Re: SCH File # 00-E-4300-0678; Draft Environmental Impact Statement RTP South and the Towns of Cary, Apex, and Morrisville - Proposed Increase in Interbasin Transfer from the Haw River Basin to the Neuse River Basin

The above referenced environmental impact information has been reviewed through the State Clearinghouse under the provisions of the North Carolina Environmental Policy Act.

Attached to this letter are comments made by state agencies, local governments, and private citizens in the course of this review. The comments need to be addressed in the Final Environmental Impact Statement. This document should be submitted to the State Clearinghouse upon completion for compliance with the North Carolina Environmental Policy Act.

Best regards.

Sincerely,

Ms. Chrys Baggett

Chap Bagatt

Environmental Policy Act Coordinator

Attachments

cc: Region J

NORTH CAROLINA GENERAL ASSEMBLY Senator Anthony E. Rand, 24th District

July 13, 2000

Chairman, Rules and Operations of the Senate Chairman, Employee Hospital and Medical Benefits Vice Chairman, Appropriations/Base Budget Vice Chairman, Information Technology

Room 300 C Legislative Office Building Raleigh, NC 27601-2808 (919) 733-9892 (919) 733-3113 Fax tonyr@ms.nega.state.ne.us

TO BE READ AT THE HEARING THIS EVENING CARY TOWN HALL, 5:00 – 7:00 P.M.

Mr. Tony Young
Hearing Officer
Division of Water Resources
Department of Environment and Natural Resources
Archdale Building
512 North Salisbury Street
Raleigh, North Carolina 27604-1148

Dear Mr. Young

AER:ec

Through my service in the General Assembly and also my service as Chairman of the Cape Fear River Assembly for several years, I have become acutely aware of the problems of water supply and the protection of the Cape Fear River Basin.

The City of Fayetteville has been blessed to be located on the Cape Fear and the founding fathers of our city knew this when they located our city there. Now there are those who would deny us our most valuable resource and take the short term approach to transfer water from our river basin. To allow others to grow at our expense would be shortsighted in the extreme. The City of Fayetteville has voted a significant bond issue in order to return the water it takes from the Cape Fear back to the Cape Fear for further use by those down stream.

We should all be good stewards of our natural resources and should not try to benefit at the expense of the less fortunate. I have no problem with the Triangle using water from the Cape Fear, but I do have significant problems with their failure to return it to where the Lord originally put it.

I appreciate your attention to this and wish you well in your efforts.

Very truly yours.

Anthony E Rand

[Letter from Lura S. Talley, former member of NC Senate]

LURA S. TALLY 3100 TALLYWOOD DRIVE FAYETTEVILLE, NORTH CAROLINA 28303 (910) 484-4868

July 7, 2000

North Carolina State Clearing House Department of Administration Attn: Chrys Baggett 1302 Mail Service Center Raleigh, North Carolina 27699-1302

Dear Sirs:

Having worked with inter-basin transfer information for a number of years when I chaired the North Carolina Senate committee on Environmental and Natural Resources, I found that the effects downstream of the transfers can be most important.

This is particularly true for the Cape Fear River and the areas depending on water from the Cape Fear River as we do in the Fayetteville area. The volume of water is of primary importance for our cleaning of the water from the river. Note that we voted 40 million dollars in local tax payer bonds several years ago to build a facility that makes it possible to return water to the Cape Fear River for further clean use downstream. This affects the river all the way to Wilmington and the towns and communities of North Carolina all the way to our coast.

As a result there is now a law forbidding the transfer of water from one basin to another unless it is cleaned and returned to the original basin.

This proposition before you removes water and affects the volume by not returning that water, cleaned, to its original basin. While we understand the problems of these areas this transfer would merely create other problems downstream. Therefore in all fairness to the Cape Fear River cities and communities of the Cape Fear River Basin it should not be allowed.

Sincerely,

Lura S. Tally

LST/lr

[Electronic Correspondence from Rollin S. Shaw, Fayetteville City Council]

Subject: Re project 00-E-4300-0678 Date: Sun, 30 Jul 2000 20:49:45 EDT

From: RollinShaw@aol.com To: Chrys.Baggett@ncmail.net

The first e-mail we sent did not list the above project number. In case you did not receive it, we restate our opposition to the transfer of water from the Cape Fear River to Cary.

We adamantly oppose, however, not returning the used, treated water if in fact Cary is permitted to draw down the Cape Fear.

It is an unconscionable proposition all the way round from the perspective of those of us in the Cape Fear River Basin who are working to improve our area.

Frank S. Shaw, M.D.

Rollin S. Shaw, Fayetteville City Councilmember

[Memorandum from David Brook, NC Dept. of Cultural Resources]



North Carolina Department of Cultural Resources

State Historic Preservation Office

David L. S. Brook, Administrator

James B. Hunt Jr., Governor Betty Ray McCain, Secretary

Division of Archives and History Jeffrey J. Crow, Director

MEMORANDUM

TO:

Chrys Baggett

Department of Administration, State Clearinghouse

FROM:

David Brook Bolor David Brook

Deputy State Historic Preservation Officer

DATE:

July 3, 2000

Re:

Final Draft Environmental Impact Statement for RTP South and the towns of Cary , Apex, and Morrisville in Wake County, North Carolina for the Increase in Interbasin

Transfer from the Haw River Basin to the Neuse River Basin, ER 99-9089

We have reviewed the above referenced document and agree that the proposed undertaking is not likely to directly affect properties listing in or eligible for the National Register of Historic Places.

The above comments are made pursuant to Section 106 of the National Historic Preservation Act and the Advisory Council on Historic Preservation's Regulations for Compliance with Section 106 codified at 36 CFR Part 800.

Thank you for your cooperation and consideration. If you have questions concerning the above comment, please contact Renee Gledhill-Earley, Environmental Review Coordinator, at 919/733-4763.

cc: ACOE, Wilmington

Triephone/Fax

[Letter from Rick Givens, Chatham County Board of Commissioners]

COUNTY OF CHATHAM

COMMISSIONERS
RICK GIVENS, Cheirmen
UVA HOLLAND, Vice Cheir
CARL OUTZ
GARY PHILLIPS
MARGARET BRYANT POLLARD



P. O. BOX 87 PITTSBORO, N. C. 27312-0087

ORGANIZED 1770

707 SQUARE MILES

July 18, 2000

CHARLIE HORNE County Manager

ROBERT L. GUNN County Attorney

Phone (919) 542-8200 Fax (919) 542-8272

John Morris, Director Division of Water Resources NC DENR Raleigh, NC 27696

Dear Mr. Morris;

With this letter Chatham County hereby formally objects to Cary's latest interbasin transfer request. As good neighbors, we appreciate their need for water and their subsequent need to discharge wastewater. We have strong concerns however, when it comes to an interbasin transfer on the magnitude of Cary's request.

We feel very strongly that users of Cape Fear water down stream deserve some assurance that adequate water supply and quality will remain available now and in the future. While Chatham County certainly understands the needs communities have for adequate water capacity to serve citizens, we also clearly understand those needs in a more global way as well. We don't have an interest in taking water in excess from waters that must also provide nourishment to thousands of North Carolina residents downstream of the Triangle area.

We hope you will hear our plea for denial of Cary's request for an interbasin discharge on the scale outlined by Cary. We appreciate your consideration and action on our request.

Sincerely,

Rick Givens Chairman, Board of Commissioners

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N.C. STATE CLEARINGHOUSE

[Letter from Larry B. Thomas, Director of Public Works, City of Sanford]

00-0678

Box 3729 Sanlord, NC 27331-3729 -City of Sanford:

PHONE: (919) 775-8231 FAX: (919) 774-8179

LARRY B. THOMAS, P.E. Director of Public Works

July 20, 2000

Chrys Baggett NC State Clearinghouse Department of Administration 1302 Mail Service Center Raleigh, NC 27699-1302

Dear Mr. Baggett:

The City of Sanford would like to voice its concern about the transfer of water from the Haw River basin to the Neuse River basin. We believe that the transfer will have a negative environmental as well as an economic effect on the basin. The cumulative effect of the existing and proposed transfer, will have a significant impact to the area.

Sanford is concerned about its future and the future of our basin. Studying the effects of each transfer individually will distort the outcome until its too late. Any study should consider the environmental condition before the original water transfers were made.

The Haw River basin is in a fairly healthy condition. With everyone's continued planning we have been able to keep it this way. We believe that this healthy state should continue if communities in our basin act responsibly. This can be true of the Neuse and other river basins in the area if communities in those basins are required to use and protect their water resources wisely. They should not be rewarded for poor resource management by being allowed to access the other basins for easy solutions.

Thank you for allowing us to comment and for your consideration regarding this matter.

Sincerely, · ·

Larry B. Thomas

Director of Pubic Works

LBT/rd

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N.C. STATE CLEARINGHOUSE

[Letter from Mick Noland, Public Works Commission, City of Fayetteville]



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July 27, 2000

Ms. Chrys Baggett Director, State Clearinghouse Department of Administration 1302 Mail Service Center Raleigh, North Carolina 27699-1302 RECEIVED

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N.C. STATE CLEARINGHOUSE

SUBJECT: SCH#: 00-E-4300-0678

SEPA Draft EIS: Proposed Increase in Interbasin Transfer for RTP South and Towns of Cary, Apex, and Morrisville

Dear Ms. Baggett:

The City of Fayetteville Public Works Commission (PWC) offers the following comments regarding the May 2000 Draft Environmental Impact Statement (EIS) for the proposed increase in interbasin transfer (IBT) for RTP South and the Towns of Cary, Apex, and Morrisville. I have organized PWC's comments into several areas as outlined below.

1. The Proposed Action Should be Redefined

Section 2.3 of the EIS states that: "... this EIS assumes the return of water to the source basin through a highly treated effluent from a regional treatment and water reclamation facility by 2010. It is also assumed that this facility will discharge into the mainstem of the Cape Fear River. However, there are no specific plans and the location of such a plant (or plants) is only speculative at this time." This statement is in direct conflict with another statement from Section 5.2 of the EIS that: "There would likely be slower growth until 2005 when a regional treatment and water reclamation facility in western Wake County is constructed."

The above contradiction is associated with the assumption made for the Proposed Action that construction of a regional wastewater treatment plant will occur in western Wake County with discharge to the Cape Fear River. We know of no reason that this can be assumed as a given. No environmental review has yet been issued for public review of such a project. We do not believe that it is appropriate to now assume that a West Cary wastewater treatment plant or some other similar project will be permitted. A SEPA review process has not even been conducted; and potential construction of such a project is envisioned by Cary as being nearly a decade away.

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Given these facts, we request that the Proposed Action be redefined as Alternative 5, which assumes that no regional wastewater treatment plant is constructed in the Cape Fear Basin.

2. The Alternative of Purchasing Water from Raleigh Should be Reevaluated Alternative 2 includes purchase of finished water from either Durham or Raleigh. The EIS points out that Raleigh has recently denied Cary's request for additional water purchases through 2003. However, Cary has a connection with the City of Raleigh with a capacity of 13 mgd and, as recently as May of this year, Raleigh did agree to sell additional water to Apex and Wendell. In addition, there have been recent reports that Raleigh could still agree to sell additional water to Cary, particularly if the State approves increasing Raleigh's water treatment plant capacity to 80 mgd.

Section 5.2 of the EIS states that: "Although the Cities of Durham and Raleigh have recently both served as regional water suppliers, their excess capacity is expected to decrease over the next ten years;..." This statement seems to be in direct conflict with Raleigh's adopted plans for greatly expanding its water treatment plant capacity in the near future and in the long-term. The adopted Wake County Water & Sewer Plan includes a recommendation that Raleigh's water treatment plant capacity be expanded to 96 mgd by 2003, to 120 mgd by 2011, and to 136 mgd by 2025. To back up this recommendation, Raleigh, just two months ago, adopted a Capital Improvement Program that allocates 54 million dollars for expanding Raleigh's water treatment capacity.

Given these facts, we request that the availability and feasibility of purchasing water from Raleigh be reevaluated in light of adopted plans to greatly expand Raleigh's water treatment capacity.

3. Future Irrigation Withdrawals Should be Described

The EIS states that agricultural water withdrawals are among the key input to the Cape Fear River Basin Model, but does not identify what assumption is made for the size of future agricultural water withdrawals. It is our understanding that agricultural withdrawals were kept at estimated 1998 levels for all modeled scenarios. Documentation should be provided in the EIS to demonstrate that it is reasonable to assume that agricultural withdrawals will not increase over time. The assumptions concerning magnitude of agricultural withdrawals will have a marked effect on simulation results and should be well-documented.

4. Randleman Lake Effects Should be Described

For the cumulative impact analysis, projected Year 2030 Greensboro demands were increased 60 percent from actual 1998 use. However, planned Randleman Lake operations were not simulated. This omission seems inconsistent with recent opinions offered by Division of Water Resources (DWR) staff that Randleman Lake will likely be

flows to 2030. In fact, the recently adopted Wake County Water & Sewer Plan includes a recommendation that the capacities of both the Cary North and Cary South wastewater treatment plants be expanded in the near future.

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approved in the near future. In fact, Section 4.5 of DWR's draft State Water Supply Plan states that: "... final approval is expected soon" for the Randleman Lake project. The EIS should address how the Cape Fear River flow regime would be affected if Randleman Lake operations were added to the model.

5. A Realistic Low Flow Impact Assessment Should be Provided for Users Downstream of Jordan Lake

The EIS scenarios do not provide a realistic low flow impact assessment for users downstream of Jordan Lake. For example, the Base 1998 scenario is supposed to represent existing basin conditions in 1998. However, Cape Fear River flows at Lillington simulated in the EIS are frequently much higher than actually occurred during the period since Jordan Lake filling was completed in 1982 (see Exhibit 1). The same phenomenon is even true for Alternative 5 (No Regional WWTP) which assumes that the 2030 IBT will be 45 mgd (see Exhibit 2). The fact is that actual Lillington flows have dropped below the 600 cfs minimum flow target every year between 1982 and 2000, often far below 600 cfs, and to levels as low as 300 cfs. In other words, the impact assessment of downstream flow conditions is theoretical rather than a realistic assessment of what downstream users can expect. The low flow periods where large flow discrepancies exist between actual and simulated levels are the same periods that are critical for evaluating the impact on downstream communities such as Fayetteville.

Section 6.0 of Appendix B of the EIS states that: "If drought management policies were considered, the impacts of the proposed action under drought conditions would be expected to be less than those reported in this TM." This is not true for those communities downstream of Jordan Lake that depend on flow levels in the Cape Fear River. The Cape Fear flow history since Jordan Lake filled clearly shows that River flow levels have often been much lower than simulated in the EIS, presumably from frequent Jordan Lake drought management actions taking place to preserve Lake storage.

Given these facts, we request that a realistic evaluation of low flow impacts below Jordan Lake be developed for the EIS.

6. The Proposed IBT Should Not be Approved When Downstream Users Are Already Facing Critical Water Supply Uncertainties

The EIS scenarios demonstrate that the Jordan Lake water quality pool is already insufficient for downstream needs. Even under the Base 1998 scenario, simulated Jordan Lake water quality storage is fully depleted so frequently that it is clear that the water quality pool is too small to maintain the 600 cfs minimum flow target at Lillington (see Exhibit 3). This demonstrates a critical problem in how current Jordan Lake storage is currently managed. The Town of Cary, in June 8, 2000 comments to DWR, echoed PWC's concern with its statement that: "It will be critical for DWR to refine the drought management plan for the water quality pool in order for the impact of lake management issues on downstream flows to be adequately evaluated."

We believe that it would make more sense to first ensure that adequate storage can be apportioned to maintain downstream flow needs before allocating additional water supply

storage. Otherwise, downstream users such as Fayetteville, who depend on Jordan Lake water quality storage to maintain the minimum flow target, can already expect insufficient Cape Fear flows during drought. This expectation is confirmed in the Base 1998 scenario results from the EIS showing Lillington flows dropping down to about 100 cfs or less during one out of every seven years (see Exhibit 4). The EIS claims that the Proposed Action will not affect downstream users' supplies or assimilative capacities. However, the EIS misses the point that the data show that there is already a problem with the water quality pool maintaining an adequate low flow regime.

Given these facts, we question the logic of approving the proposed IBT when, even under existing conditions, downstream users already face such critical supply uncertainties

7. The Proposed IBT Should Not be Approved When the Jordan Lake Safe Yield is Still Uncertain

The EIS scenarios demonstrate that the current Jordan Lake water supply safe yield estimate is questionable. The Proposed Incremental scenario assumes that total Jordan Lake withdrawals equal 100 mgd. Under this scenario, simulated Jordan Lake water supply storage is fully depleted in 1933, 1934, 1953 and 1954 and nearly depleted in 1986 (see Exhibits 5, 6 and 7). We question the legitimacy of the 100 mgd safe yield estimate for Jordan Lake when these EIS results show water supply storage being fully depleted in multiple droughts and fully depleted or at less than 5 percent for over three consecutive months in one drought (1933-1934) (see Exhibit 6). At the very least, these results demonstrate that the 100 mgd estimate may be optimistically high. This is even before considering the potential safe yield reduction if the "50 Percent Rule" were modified to allow a greater than 50 percent diversion of the water supply pool out of Jordan Lake's watershed.

Given these facts, we question the prudence of approving the proposed IBT when this level of uncertainty exists with this most basic assumption of available safe yield for allocation.

8. An Additional Scenario is Needed for Evaluation of Impacts from Proposed Allocation and Resulting IBT

Section 4.0 of Appendix B of the EIS states that: "Potential impacts of the requested IBT are evaluated in comparison to the Base Future scenario in order to isolate IBT impacts from the impacts of full Jordan Lake allocation use." However, there is no scenario presented which considers only the incremental impacts of the Proposed Action. Even the Proposed Incremental scenario assumes that total Jordan Lake withdrawals equal 100 mgd. Jordan Lake water supply storage frequency curves show that there is a tremendous increase in frequency of water supply storage depletion when going from the Base 1998 scenario to the Proposed Incremental scenario (see Exhibit 8). A scenario should be included which adds only the proposed allocation and IBT to Base 1998 conditions so that the resulting simulation of water supply storage and its acceptability can be evaluated.

9. Impacts Should be Portrayed that are Attributable to Proposed Allocation and Resulting IBT

Section 5.1 of Appendix B of the EIS states that: "... the largest impacts on the Jordan Lake system will occur from the increased use of the water supply pool. However, this simply represents transition to full utilization of the lake as it as designed, and is not an impact of the proposed IBT." Section 6.0 of Appendix B similarly states that: "Some impact is expected compared to current conditions due to the eventual use of the full Jordan Lake water supply pool as designed, but this is unrelated to the proposed IBT." These statements seem to imply that the proposed allocation and resulting IBT does not contribute to the massive increases in water supply storage depletion which can be clearly seen in Exhibits 5 through 8. We reiterate that an objective presentation of the incremental effects of the Proposed Action would show simulation results for an additional scenario in which only the proposed allocation and IBT is added to Base 1998 conditions. These results could then be compared to simulated Base 1998 conditions and would show the impacts attributable to the Proposed Action.

10. The Acceptability of Cumulative Impacts Should be Assessed

Section 5.2 of Appendix B of the EIS states that: "The results show that the Proposed action does not show a significant impact compared to Alternative 1A. Also, the potential cumulative impacts of increasing all water withdrawals and discharges throughout the Cape Fear basin do not seem significant compared to the Base Future scenario." The impacts of the Proposed Action may appear to be small when compared to the cumulative effects under scenarios which assume that total Jordan Lake withdrawals equal 100 mgd. While the EIS includes scenarios in which the total Jordan Lake water supply pool is utilized, the real question of whether the cumulative impacts are acceptable is not addressed in the EIS.

11. An Objective Evaluation of the EIS is Needed Regardless of the Construction Already Underway to Make Use of the Proposed Allocation and IBT

Cary/Apex water supply system improvements are already well underway that would allow withdrawal and treatment of an expanded Jordan Lake allocation. These improvements include expansion of the water treatment plant, expansion of the raw water pump station, and construction of a raw water transmission line. Millions of dollars have already been spent on this construction which began last year in October. These improvements have been made without EMC approval of the proposed IBT and constitute a sizeable and calculated risk for these communities.

Given these facts, it's critical that the EIS be objectively evaluated even though millions of dollars have already been spent on construction. This critical need is highlighted by the fact that the recommendations from Cary's Long Range Water Supply Plan show application to the State for an additional 14 mgd allocation of Jordan Lake water supply storage in Spring 2001.

In closing, I want to emphasize that we now have the opportunity to take a positive step toward ensuring that the Cape Fear River remains available for the present and future generations who will have to rely on this resource. The serious warning signs

that already exist in this basin should cause all of us to stop and make sure that these issues are addressed now, while the opportunity still exists, and before irreversible actions are taken. We merely need to look at the water quality issues in the adjacent Neuse River Basin to see how serious problems can easily overtake us if we don't take full account of the warning signs. A more pro-active approach to management of our basin would ultimately be in everyone's best interests rather than allowing expediency to govern our actions. The State has already recognized the need for, and committed to, long-range Cape Fear Basin water supply planning to address Jordan Lake allocation requests made during the current second round and upcoming third round of requests. This planning of how best to utilize basin water resources should be done before, and not after, decisions to allocate more of Jordan Lake's water supply storage.

Thank you for the opportunity to express the views of the City of Fayetteville Public Works Commission. We respectfully ask that each of our concerns be satisfactorily addressed before any final decisions are made concerning the requested IBT.

Very truly yours,

PUBLIC WORKS COMMISSION

M. J. Noland, P.E.

Chief Operating Officer Water Resources Division

Attachments

cc: Bill Holman Mark Broadwell

Melba McGee
Interested Parties

EXHIBIT 1: CAPE FEAR RIVER FLOW AT LILLINGTON - JAN. 1982 TO DEC. 1998 (DEIS SCENARIO: BASE 1998)

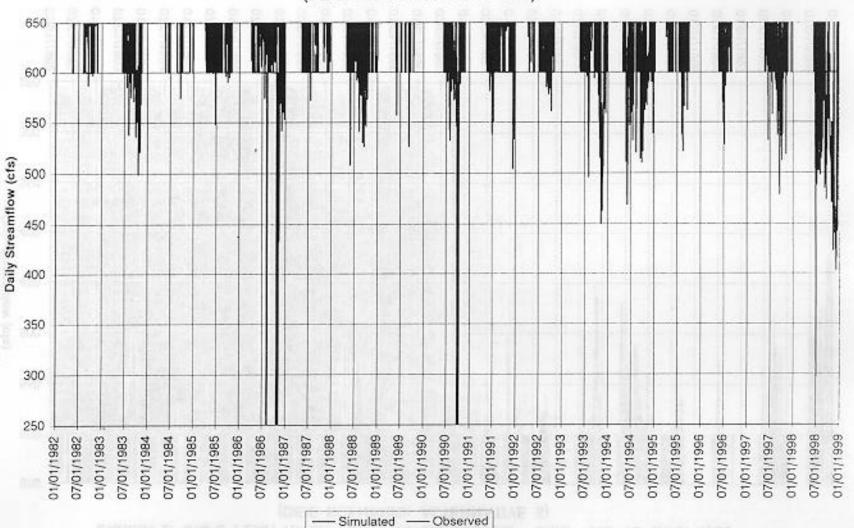


EXHIBIT 2: CAPE FEAR RIVER FLOW AT LILLINGTON - JAN. 1982 TO DEC. 1998 (DEIS SCENARIO: ALTERNATIVE 5)

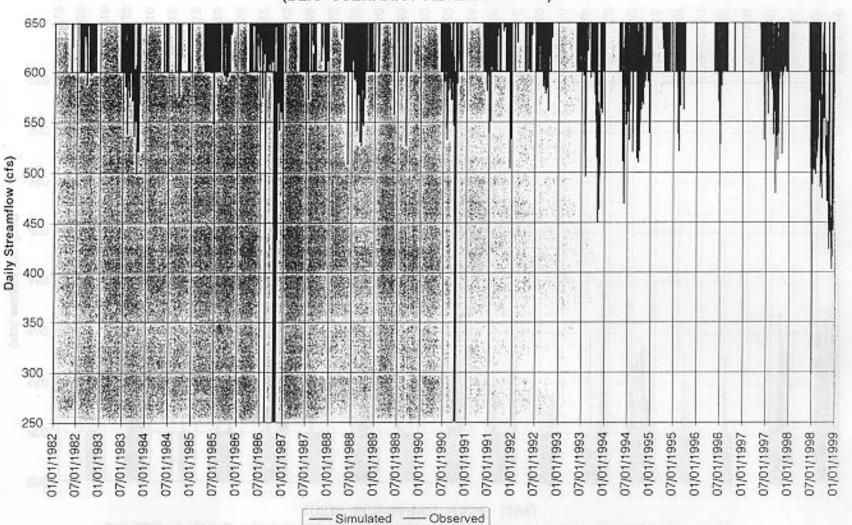


EXHIBIT 3: JORDAN LAKE WATER QUALITY STORAGE - JAN. 1930 TO DEC. 1998 (DEIS SCENARIO: BASE 1998)

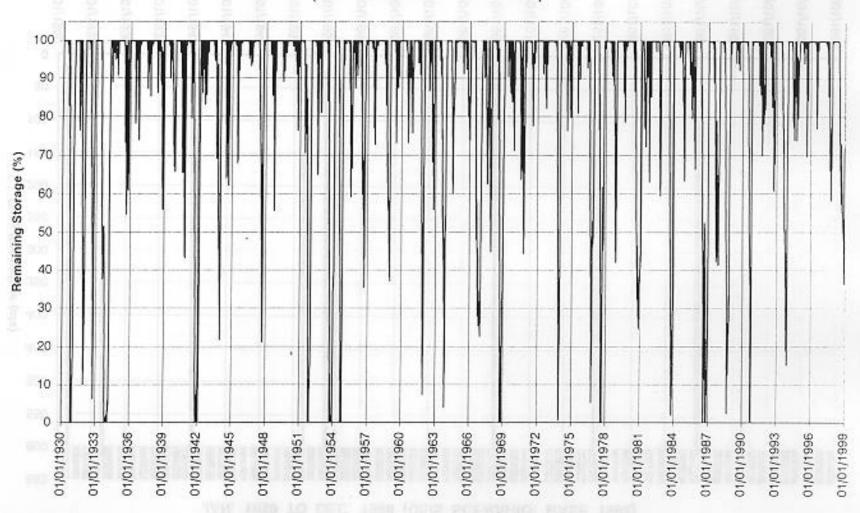


EXHIBIT 4: SIMULATED CAPE FEAR RIVER FLOW AT LILLINGTON JAN. 1930 TO DEC. 1998 (DEIS SCENARIO: BASE 1998)

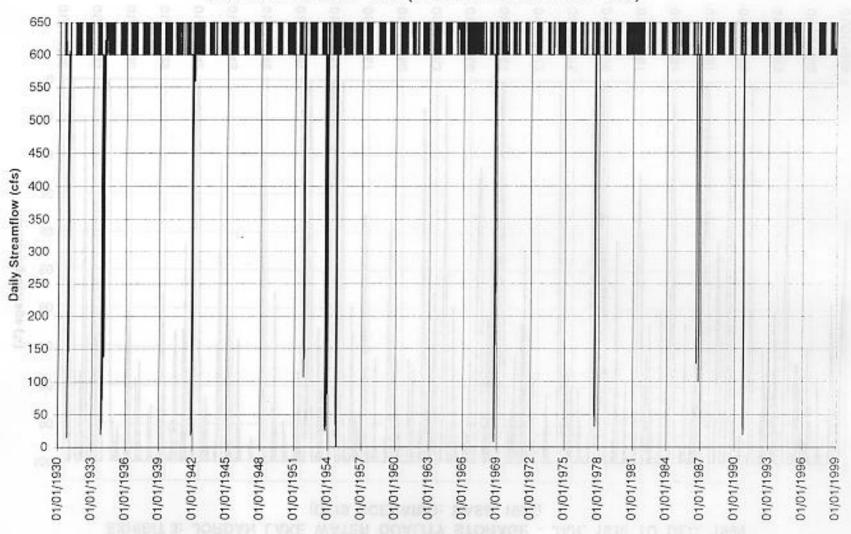


EXHIBIT 5: JORDAN LAKE WATER SUPPLY STORAGE JAN. 1930 TO DEC. 1998 (DEIS SCENARIO: PROPOSED INCREMENTAL)

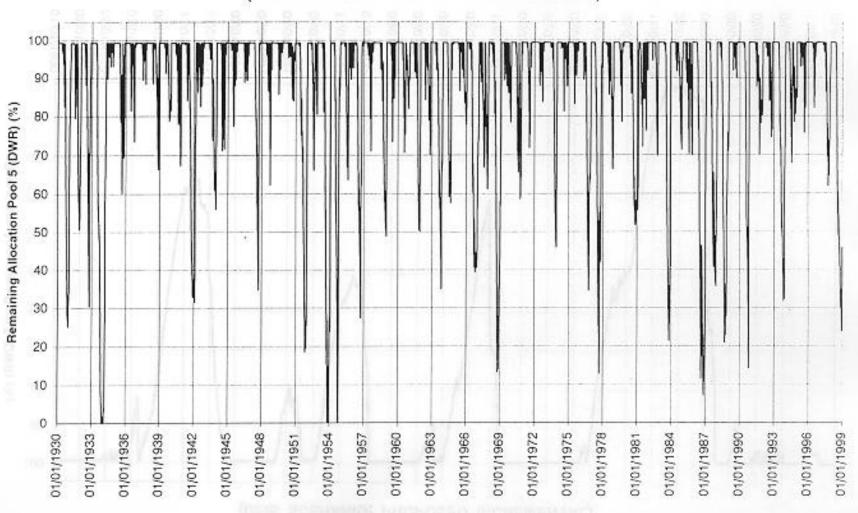


EXHIBIT 6: JORDAN LAKE WATER SUPPLY STORAGE JAN. 1930 TO DEC. 1934 (DEIS SCENARIO: PROPOSED INCREMENTAL)

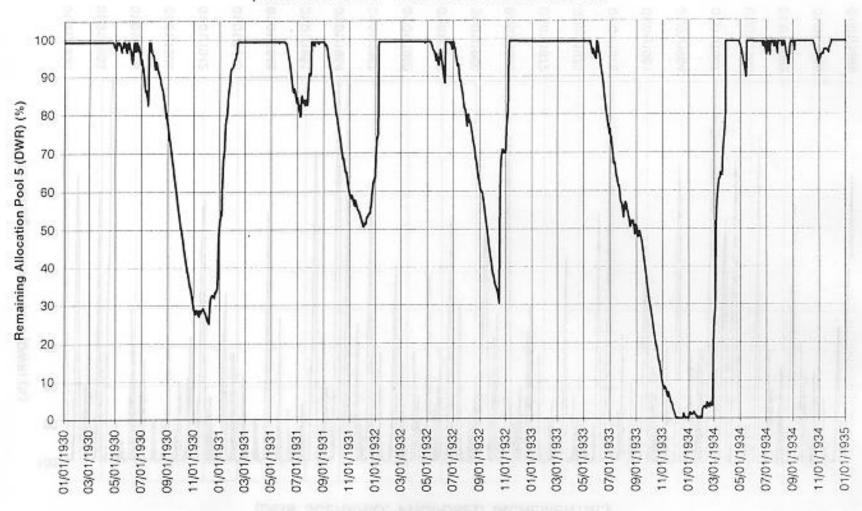


EXHIBIT 7: JORDAN LAKE WATER SUPPLY STORAGE JAN. 1951 TO DEC. 1955 (DEIS SCENARIO: PROPOSED INCREMENTAL)

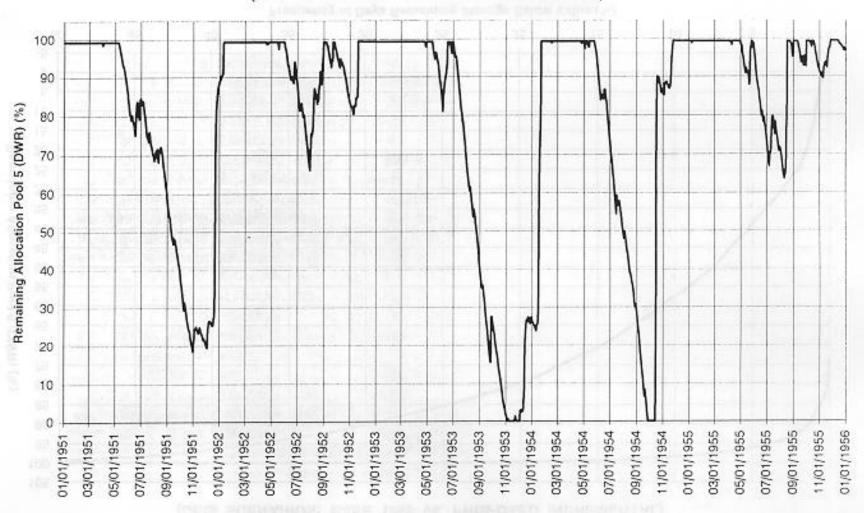
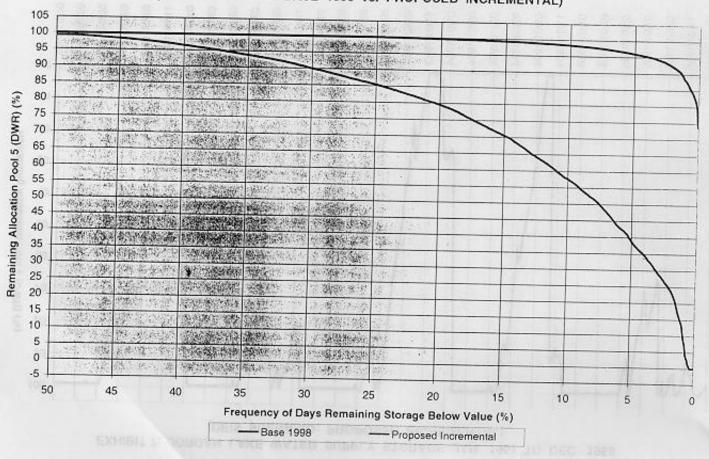


EXHIBIT 8: JORDAN LAKE WATER SUPPLY STORAGE FREQUENCY CURVES (DEIS SCENARIOS: BASE 1998 vs. PROPOSED INCREMENTAL)





CITY OF WILMINGTON

PUBLIC UTILITIES DEPARTMENT

P.O. Box 1810 WILMINGTON, NC 28402 TDD (910) 341-7873

July 27, 2000

N.C. State Clearinghouse Department of Administration 1302 Mail Service Center Raleigh, NC 27699-1302 Attn: Chrys Baggett

Re:

Project Reference Number 00-E-4300-0678 Cary/Apex/Morrisville/Wake Draft EIS

Dear Sir:

The City of Wilmington appreciates the opportunity to comment on the Cary/Apex/Morrisville/Wake County Draft Environmental Impact Statement for their water supply allocation and interbasin transfer (IBT) request from Jordan Lake. Although the City of Wilmington is located well downstream from Jordan Lake, we do have some concerns regarding potential impacts to the water quality pool at Jordan Lake, low flow augmentation from Jordan Lake, beginning a trend of negative IBT's in the Cape Fear Basin and impacts on the assimilative capacity of the Lower Cape Fear Basin.

Jordan Lake was designed to provide flow augmentation to maintain downstream Cape Fear River water quality during natural low flow periods. Even with the designated augmentation pool, there have been incidents when the target flow at Lillington has not been met, potentially impacting downstream water quality and assimilative capacity. The EIS did not address the water quality impacts of the IBT on the Lower Cape Fear Basin where some stream segments have been placed on the 303d list due to low dissolved oxygen quantities. The conclusions in the EIS assume the construction of a future water reclamation facility discharging to the Cape Fear Basin but there are no specific plans for the facility.

Durham has also applied for an allocation from Jordan Lake, which will not result in an IBT, but will result in a net loss to the Cape Fear Basin by correcting an existing IBT from the Neuse to the Cape Fear basin. The Draft EIS did not consider the effects of this loss to the Cape Fear Basin.

We urge the Division of Water Resources and the Environmental Management Commission to fully consider the needs of the downstream stakeholders when reviewing allocation and IBT requests. Water supply assimilating capacity and water quality for downstream stakeholders should be protected.

JUL 3 1 2000

N.C. STATE CLEARINGHOUSE

Yours Very Truly,

Hugh T. Caldwell, P.E. Director of Public Utilities

cc:

Mary M. Gornto, City Manager

Ken Vogt, Superintendent of Wastewater Treatment

[Letter from Rodney Tart, Harnett County Dept. of Public Works]

Jul-31-2000 03:17am From-HASNETT CO PUS OTIL

9109936643

T-405 P 001/002 F-155

HARNETT COUNTY DEPARTMENT

MEMBER NORTH CAROLINA BURAL WATER ASSOCIATION

MEMBER AMERICAN WATER WORKS ASSOCIATION

BUIES CREEK - COATS WATER A SEWER DATING SOUTH CENTRAL WATER & SEWER DISTRICT WEST CENTRAL WATER & SEWER DISTRICT

NORTHEAST METROPOLITAN WATER DISTRICT ÉAST CENTRAL WATER & SEWER DISTRICT BUNNIÉVEL - RIVERZOE DISTRICT

NORTHWEST WATER & SEWER DISTRICT SOUTHWEST WATER & SEWER DISTRICT SOUTHEAST WATER & SEWER DISTRICT

July 31, 2000

Ms. Chrys Baggett North Carolina Clearinghouse Department of Administration 1302 MSC Raleigh, NC 27699 1302

Re: Draft Environmental Impact Statement Interbasin Transfer RTP South and Towns of Cary, Apex, and Morrisville

Dear Ms. Baggett:

Harnett County Public Utilities Department has reviewed the Draft Environmental Impact Statement prepared in support of the Interbasin Transfer from the Haw River Basin to the Neuse River Basin being proposed by RTP South and the Towns of Cary, Apex, and Morrisville. We wish to comment as follows:

- The proposed Transfer does increase the water withdrawals from Lake Jordan and more importantly, from the Cape Fear River Basin. It is proposed that approximately 27 mgd of this withdrawal would not be returned to the River Basin. This is an increase of approximately 11 mgd over the currently permitted 16 mgd.
- The Mike Basin models accompanying the EIS indicate that the proposed withdrawals will have minimum impact upon the Cape Fear River at the gauging station in Lillington.

Post-It* Fax Note 7671

RECEIVED

JUL 3 1 2000

N.C. STATE CLEARINGHOUSE

Page 1 of 2

POST OFFICE BOX 1119 • ULLINGTON, NORTH CAROUNA 27546 • 910/893-7575 • FAX 910/893-6643

QUALITY ON TAP, OUR PROFESSION, OUR COMMITMENT

Environmental Impact Statement Interbasin Transfer RTP South and Towns of Cary, Apex, and Morrisville

Page 2 of 2

July 31, 2000

 Draft Based upon these analyses, Harnett County does not object to the Interbasin Transfer as proposed. We are, however, conscience that water resources in the State, and specifically, in the Cape Fear River Basin, will become more limited in the future as North Carolina continues to grow. Accordingly, for the long term, we believe it prudent planning to require that the waters removed from the River Basin be returned so that others downstream can benefit from this resource.

We fully support the effort of the Division of Water Resources to develop a comprehensive model of future Cape Fear Basin River use.

proposed that approximately 27 mod of this withdrawal would not be

mad over the ourselly permitted 16 mod.

Thank you for this opportunity to respond to the proposed Draft EIS. Should you have any questions, please contact us.

Sincerely

Rodney M. Tart

HCDPU Director

[Electronic correspondence from Hal Broadfoot, Citizen of Fayetteville]

Subject: Cape Fear Interbasin Transfer Date: Thu, 13 Jul 2000 16:59:36 EDT

From: HALWB@aol.com To: Chrys.Baggett@ncmail.net

Project reference # 00-E-4300-0678

STOP THE TRANSFERS

I, for one, am tired of the Triangle angle financing its growth by stealing resources from other parts of the state. Today, I refer to the proposed theft of additional billions of gallons of Cape Fear River basin water in the coming year. Theft is not too strong a word. The Wake County cities want to knowingly remove a resource from its rightful owners and transport that resource away from those owners with the intention of never returning it. That is theft. Look it up.

I live downstream in Fayetteville. We, unlike our wealthy neighbors to the north, have invested in state-of-the-art water treatment and supply systems. Yes, we use river water, but the water we use from the river returns to the same Cape Fear River basin often cleaner than when we took it out.

I wish that were true of water systems across the state. I wish that were true of Orange County, Wake County and Durham County.

Do not give Cary or any other upstream town any more of our water. They have proven they cannot handle growth responsibly. I am tired of financing the growth of the Triangle. Make them pay their own way. Make them raise taxes and build the water system they were supposed to have completed already.

Water is not a free resource. It is a valuable commodity. Do not allow Cary to steal any more water from Lillington, Fayetteville, Elizabethtown and Wilmington. If they get the right to use our water, make them put it back in our basin cleaner than when they borrowed it.

Say NO to the transfer,

Hal Broadfoot Fayetteville, NC

[Electronic corresondence from Reid Gant, Citizen of Fayetteville]

CC: ReidGantt@aol.com

Approving the transfer of water from the Cape Fear river to Cary, Wake County, Apex and Morrisville and allowing them to dump the wastewater into the Neuse river basin would eventually be an environmental disaster for the Cape Fear river. Our State legislators should NOT let this happen. Any water approved to be taken by these cities must be returned to the Cape Fear river basin.

A concerned citizen of the Cape Fear river basin

[Electronic Correspondence from Marie Tinnin Stewart, Citizen of Fayetteville]

Subject: Project reference no 00-E-4300-0678 Date: Thu, 13 Jul 2000 16:42:51 -0400

From: Marie Stewart <stewart@fayettevillenc.com>

Organization: InfiNet

To: Chrys.Baggett@ncmail.net

As a life long resident of Fayetteville, I strongly protest the proposed application from Wake County, Cary and Apex to take more water from the Cape Fear River Basin. First install a treatment plant that would correct the interbasin imbalance and then make your application.

Marie tinnin Stewart
216A DeVane Street
Fayetteville, NC 28305

[Electronic Correspondence from Scott M. Bigelow, Citizen of Lumberton]

Subject: Interbasin water transfer public comment

Date: Wed, 12 Jul 2000 11:23:27 -0400

From: bigelow@nconline.com To: Chrys.Baggett@ncmail.net

Dear Sirs:

I am extremely concerned about the next proposed interbasin water transfer from the Cape Fear to the Neuse. My concerns are both environmental and economic but probably not scientific because I am a layman.

- Conservation. What serious water conservation efforts have been taken in the Triangle? Are they still watering lawns? Is water still ridiculously cheap? Before taking extreme measures shouldn't simple ones be used first.
- 2. Why not build a new wastewater plant? Saying wastewater must return to the Neuse River basin because the treatment plant is there is not an argument. If they are unwilling to spend the money to build a treatment plant on the Cape Fear side how badly do they really need water? If these municipalities cannot get permits to put wastewater into the Cape Fear, then the pollution levels must too high to take any more water out. Cary et. all just want cheap water.
- 3. Longer perspective. Was the economic impact study paid for by the towns made from a 100-year perspective. What would happen in a 100-year drought? 100-year flood is the standard for flooding. Is the same tried and true standard being used for drought? In a drought, pollution is amplified.
 - 4. Pollution. Did economic impact study take into account pollution on the Cape Fear, which latest studies that I read indicate are at the maximum allowable levels? The state denied Smithfield Foods a permit to dump more waste into the river? Water volume is one of two critical factors in pollution.
 - 5. Planning. Good planning would dictate that this state should grow in areas that have the resources to support it. This proposal will result in an urban build-up that will be regretted later. The Cape Fear Basin would welcome growth like the state promoted in the Triangle when it invested in universities, roads and the RTP there.
 - 6. More study. North Carolina is just on the edge of water problems like the West has. Why not do a real study, funded by the legislature and learn from their failures while we have the time.
 - 7. Water for sale. If water is so important, put a price on it. Put supply and demand to work. Why should water free?
- 8. A temporary agreement. Make any water transfer continent upon certain environmental and economic factors. If the water quality of the Cape Fear declines, revoke or cut back transfers. If growth in the Cape Fear requires more water, then cut back the transfers. No permanent water rights should be established. This will also provide incentive for the Triangle to find other options.

9. Hold hearings in the Cape Fear, not in Cary. This is not a good by the ball the block sign for a real public input into the decision-making process.

The Triangle doesn't need water. They just want cheap water and easy solutions. This is clearly a "have" vs. "have not" situation. The Triangle will take the economic future from another area for its benefit. They are not even offering anything in return.

Thank you for any consideration.

Scott M. Bigelow

1106 Chestnut Street 1106 Chestnut Street Lumberton, NC 28358

in cause that have the resources to support it. This proposed will result in an ution Suild up that will be regretted later. The Cape Past later would welcome growth like the state promoted in the

2 MA TEST WASTER

[Letter from Col. W.S. Crumlish, Retired, Corps of Engineers]

COL. W. S. CRUMLISH, USA RET. 821 NORTHAMPTON ROAD FAYETTEVILLE. NORTH CAROLINA 28303

11 July 2000

NC State Clearinghouse Dept of Administration 1302 Mail Service Center Raleigh, NC 27699-1302 Attn: Chrys Baggett project # 00-E-4300-0678

Reference is made to the proposed transfer of water from the Cape Fear River basin to Cary and others NOT in the Cape Fear watershed !

This action in my engineering opinion is DIASTER for the future of Fayettevile and others downstream from Lake Jordan..

It is wrong to transfer water from one watershed to another especially when said water flow NEVER is returned to the original watershed.

It was a bad decision to have already authorized a transfer from Lake Jordan to others not in the Cape Fear watershed.

To again permit this additional transfer is totally WRONG..

People should live and work where God placed the water- not the reserve...

Wars have been fought over the centuries over water. The present proposed fiasco is no different than in the past. When will we ever

Recommend NO action on the planned water transfer EVER....

Yours,

WILLIAM S. CRUMLISH, PE (Reg PE in Missouri and Texas)

Colonel, USA Ret

Corps of Engineers..

[Letter from Walter D. Dietrich, Citizen of Fayetteville]

429 Summeries Dr. Fayetteville, NC 28311 July 16, 2000 Ph. (910) 488-3118

Attn: Chrys Baggett
N.C. State Clearinghouse
Department of Administration
1302 Mail Service Center
Raleigh, NC 27699-1302

Dear Sin.

This letter is in reference to project # 00-E-4300-0678.

I am opposed to allowing any increase in the interbasin transfer of water from the Cape Fear River basin to the Neuse River basin as requested by Cary, Apex, Morrisville and Wake County. This is an environmentally unsound practice. I believe the State has under estimated the drinking water capacity of Lake Jordan. Did they evaluate the other water uses, i.e. industry, farming, etc? Did they only estimate the capacity based on the size of Lake Jordan? Did they use mean depth of Lake Jordan over the year? While this summer has been one of the wettest, there have been far more summers when I have witnessed the Cape Fear River at a trickle though Lillington and Fayetteville.

Furthermore, before any more increases or further transfers are approved from one watershed to another in this State; the requesting community should have a water treatment facility completed to return equal capacity. The above requesting communities have long known about the shortage of water to facil their expansion and economic growth but have decided to do nothing. They know they have the political influence to get approvals at the expense of the lower income communities down river. This is another example of the State treating Fayetteville, Cumberland County as the "runt of the litter".

Governor Hunt said he wanted North Carolina to be the "Green State". I see the continual extraction of water from this river basin making this the "Brown Area" of the "Green State".

I hope you do the right thing for the environment and the folks downstream and reject this request for an increase until the communities complete a treatment facility to return equal capacity back into the Cape Fear River basin. Thank you for your time and any support regarding this matter.

Sincerely.

Senator T. Rand

Valter D. Dietrich

4 Detreet

[Electronic correspondence from James and Jenny Rosser, Citizens of Fayetteville]

Subject: Project # 00-E-4300-0678 Date: Sun, 30 Jul 2000 20:47:18 EDT

From: JROSS70@aol.com To: Chrys.Baggett@ncmail.net

We are writing to ask that any water taken from the Cape Fear River for Apex or anywhere else be RETURNED TO the Cape Fear River. Please please be aware this is so important to our community!

Sincerely, James and Jenny Rosser Fayetteville, NC

[Electronic correspondence from Maryann and Bob McCoy, Citizens of Fayetteville]

Subject: 00-E-4300-0678

Date: Sun, 30 Jul 2000 20:47:55 EDT From: MAMcCoy34@aol.com To: Chrys.Baggett@ncmail.net

Concerning Cary,s use of the water from the Cape Fear River. Please return any water to the Cape Fear River!!!!! Fayetteville has great use of the water and our future growth will depend on this water!!!!! Thank you - maryann and Bob McCoy 120 Sutton St. Fayetteville, N. C. 28305

[Electronic correspondence from D.R. Nimocks, Jr., Citizen of Fayetteville]

Subject: cary's use of cape fear river water - project #00-E-4300-0678"

Date: Mon, 31 Jul 2000 21:59:22 -0400

From: drn12@juno.com

To: Chrys.Baggett@ncmail.net

dear sir: i see no reason for cary and other n.c. cities NOT to use the water from the cape fear river as long as this water is CLEANED and put back in the cape fear river.

I am not in favor of water being taken out of the cape fear, used by a n.c. city, and then this water put back in another river.

over a period of time we will end up with the cape fear river being similar to the Colorado river, and i am sure no one wants this to happen, especially the people below the cary pump out station that depend on the cape fear water for drinking, etc.

cordially,

d.r. nimocks, jr. fayetteville, n.c.

Attachments Part D

Proposed Increase in Interbasin Transfer RTP South and Towns of Cary, Apex, and Morrisville

NOTICE OF PUBLIC HEARING

July 13, 2000, 5:00-7:00 PM

The North Carolina Department of Environment and Natural Resources will hold a public hearing to receive comments on the Draft Environmental Impact Statement prepared by RTP South and the Towns of Cary, Apex, and Morrisville for the proposed increase in interbasin transfer from the Haw River Basin to the Neuse River Basin. The transfer is associated with increased water withdrawals from Jordan Lake.

The public hearing will be conducted from 5:00 to 7:00 PM on Thursday, July 13, 2000 at Cary Town Hall, Building A, Council Chambers, 316 N. Academy Street, Cary, NC. In addition, staff will be available to answer questions from 4:00 PM to 5:00 PM at the hearing location. The draft EIS may be inspected during normal business hours at the offices of the Division of Water Resources, 512 N. Salisbury Street, Room 1106, Archdale Building, Raleigh. Written statements of oral comments at the hearing are requested. If you are unable to attend, written comments can be mailed to the State Clearinghouse at the address listed below. The project reference number is 00-E-4300-0678. Comments must be received before 5:00 PM, July 31, 2000.

N.C. STATE CLEARINGHOUSE DEPARTMENT OF ADMINISTRATION 1302 MAIL SERVICE CENTER RALEIGH, NC 27699-1302 ATTN: CHRYS BAGGETT

Comments may also be submitted electronically to chrys.baggett@ncmail.net

*Note, a separate hearing will be held by the Environmental Management Commission on the applicants' petition for an interbasin transfer certificate in conjunction with their request for a water supply allocation from Jordan Lake. That hearing is tentatively scheduled to occur in November, 2000.

Background

In conjunction with their request for a water supply allocation from Jordan Lake, the applicants (RTP South and Towns of Cary, Apex, and Morrisville) have requested to increase their interbasin transfer from the Haw River Basin to the Neuse River Basin from 16.0 to 27.0 million gallons per day (MGD). Under the Regulation of Surface Water Transfers Act (G.S. 143-215.22I), persons intending to transfer 2.0 MGD, or increase an existing transfer by 25 percent or more, must first obtain a certificate from the Environmental Management Commission (EMC). As part of the petition process, an applicant must complete an environmental assessment (EA) or environmental impact statement (EIS). The Department determined that an EIS was the appropriate review document for this project.

The State of North Carolina has been assigned the use of the entire water supply storage in Jordan Lake and, under G.S. 143-354(a)(11), can assign this storage to local government having a need for water supply storage. Initial allocations of water supply from Jordan Lake were made in 1988. The State is currently in the second round of allocations. Ten communities have requested new or additional allocations from Jordan Lake. Several of those requests involve interbasin transfers between the Cape Fear River and Neuse River basins. See table below.

Jordan Lake Water Supply Storage Allocations (a)

		Requested	Recommended	Interbasin Transfer
	Current	Additional	Additional	Certification
Applicant	Allocation	Allocation	Allocation	Required
	(MGD)	(MGD)	(MGD)	
Chatham County	6.0	7.0	(b)	Unknown
Durham	none	25.0	0.0	No
Fayetteville	none	20.0	0.0	No
Greensboro	none	25.0	0.0	No
Holly Springs	none	4.5	2.0	No
Cary/Apex	16.0	29.0	5.0	Yes
Morrisville	none	4.5	2.5	Yes
Wake County/	none	3.5	1.5	Yes
Research Triangle Park				
Harnett County	none	12.0	(c)	Unknown

- (a) Allocations obtained are actually a percentage of the water supply storage in Jordan Lake. However, since all (100 percent) of the water supply storage has an estimated safe yield of 100 MGD, allocations are conveniently expressed here in terms of MGD. For example, a 6.0-MGD allocation actually represents an allocation of 6.0 percent of Jordan Lake's water supply storage.
- (b) The EMC approved Chatham County's petition to have their request considered with those requests requiring interbasin transfer certification
- (c) Because of the timing of Harnett County's allocation request, it will be processed with those requests requiring interbasin transfer certification.

In December 1997, the EMC decided on allocation requests not involving a transfer. The EMC deferred its decision on those requests involving a transfer until the required environmental documentation is completed. In addition, the EMC deferred its decision on Chatham County and Harnett County pending additional information. DENR has completed its review of the EIS for the proposed interbasin transfers. The document has been sent to the State Clearinghouse for a 45-day public review.

Next Steps:

July 2000 The Division holds public hearing on EIS for interbasin transfer request.

September 2000 The Division presents recommendations to the Water Allocation

Committee of the EMC.

October 2000 Full EMC acts on recommendation to hold public hearing.

November 2000 EMC holds public hearing on allocation and transfer requests .

February 2001 Hearing Officer presents report to full EMC. EMC issues decision

on allocation and transfer requests.

For more information, visit our project website at: http://www.ncwater.org/ibt/caryeis.html. You may also contact Mark Broadwell in the Division of Water Resources at 919-715-0386, or email: mark.broadwell@ncmail.net.

List of Persons Attending Hearing

Hearing Officer

Tony Young, Division of Water Resources, Raleigh, NC

Staff Members

Tom Fransen, DENR, Division of Water Resources, Raleigh, NC Mark Broadwell, DENR, Division of Water Resources, Raleigh, NC Sheila Thomas Ambat, DENR, Division of Water Resources, Raleigh, NC Sydney Miller, DENR, Division of Water Resources, Raleigh, NC Steve Zoufaly, DENR, Division of Water Quality, Raleigh, NC Cam McNutt, DENR, Division of Water Quality, Raleigh, NC Bill Reid, DENR, Division of Water Quality, Raleigh, NC Michael Douglas, DENR, Division of Environmental Health, Raleigh, NC

Others in Attendance

Mick Noland, City of Fayetteville Public Works Commission
C. John Malzone, Fayetteville / Cumberland County Chamber of Commerce
Elton Hendricks, Methodist College, Fayetteville, NC
Patti Dukes, Moncure, NC
Francine Durso, Arcadis Geraghty & Miller, Raleigh, NC
Gary Shope, Research Triangle Foundation, RTP, NC
Jennifer Platt, Town of Cary, Cary, NC
Mark Brown, S&ME, Raleigh, NC
Dan Boone, The Wooten Company, Raleigh, NC
Tommy Esqueda, CH2M Hill, Raleigh, NC
Don Freeman, Cape Fear River Assembly, Fayetteville, NC
Jeri Gray, Water Resources Research Institute, Raleigh, NC

Robert K. (Kim) Fisher, Town of Cary, Cary, NC Tim Donnelly, Town of Apex, Apex, NC

A.T. Rolan, City of Durham, Durham, NC

Paul Peterson, Malcolm Pirnie, Newport News, VA

Patrick Davis, Triangle J Council of Governments, RTP, NC

Ronald Singleton, Chatham County Public Works, Pittsboro, NC

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David Nash, City of Fayetteville, Fayetteville, NC

Chad Ham, Public Works Commission, City of Fayetteville, Fayetteville, NC

Transcript of Public Hearing July 13, 2000 Cary Town Hall Cary, North Carolina

Increase in Interbasin Transfer From the Haw River Basin to the Neuse River Basin

Wake County (RTP South) and Towns of Cary, Apex, and Morrisville

[Hearing Officer: Tony Young]

I will now call the hearing to order. I am Tony Young with the NC Division of Water Resources. I will be the Hearing Officer for this afternoon's public hearing. This hearing is on the Draft Environmental Impact Statement for the proposed increase in interbasin transfer from the Haw River Sub-basin to the Neuse River Sub-basin. The applicants are Wake County/RTP South and the Towns of Cary, Apex, and Morrisville.

This hearing has been called pursuant to North Carolina Administrative Code Title 1, Chapter 25, Section .0604 for the purpose of inviting public comment on the subject Draft Environmental Impact Statement. All comments received will be included in the Final Environmental Impact Statement and presented to the Environmental Management Commission at one of their upcoming meetings. Public notice of this hearing was provided electronically to over 350 parties who had registered to receive announcements regarding Jordan Lake allocation issues. Notice was also sent by first class mail to members of the Environmental Management Commission, current Jordan Lake allocation holders, and Jordan Lake allocation applicants. Public Notice was published in the Raleigh News and Observer on June 29, 2000 and in the Fayetteville Observer Times on June 30, 2000.

I have a few administrative announcements to make. As you entered, you should have filled out one of the registration forms so that we will have a record of your attendance. You should have also indicated on the form whether or not you wish to speak this evening. Please go to the registration table at this time if you have not already registered. Also, copies of the hearing notice that was mailed and the executive summary from the Draft Environmental Impact Statement are available at the sign-in desk.

I would like to note that it is common for acronyms to be used in a regulatory discussions. The ones you are most likely to hear this afternoon are **EIS** for Environmental Impact Statement, **IBT** for interbasin transfer, and **EMC** for the Environmental Management Commission. For the sake of the general public, I urge all speakers to try to limit their use of acronyms.

I would now like to recognize Mark Broadwell, with the Division of Water Resources. Mark is the project manager for this request. He will present some background information on the approval process for interbasin transfers.

[Verbal comments by Mark Broadwell, NC Division of Water Resources follow]

I would like to take a few minutes and provide some background on this interbasin transfer request and the certification process. The proposed transfer is associated with the applicant's requests for water supply allocations from Jordan Lake. Jordan Lake is a multi-purpose reservoir completed in 1982 by the US Army Corps of Engineers. The State of North Carolina has been assigned the use of the entire water supply storage in Jordan Lake, and the Environmental Management Commission can assign this storage to any local government having a need for water supply. The two main criteria, in the administrative rules, for Jordan Lake water supply allocations are future water needs and availability of alternative water supplies. Also, the administrative rule requires the Environmental Management Commission to coordinate the review of any allocation requests with the certification of any interbasin transfers that may be required.

The first round of allocations were made in 1988, including a 16 million gallon per day allocation to the Towns of Cary and Apex. The Commission also approved Cary and Apex's diversion of the water from Jordan Lake to the Neuse River. In 1996, Cary and Apex filed a request for an additional allocation based on increasing water demands. Following this request, the Division opened a new round of allocations. In all, ten local governments have filed new applications for water supply from Jordan Lake.

In June 1997, the Division presented allocation recommendations to the Environmental Management Commission. The Commission made a single allocation of 2.0 million gallons per day to the Town of Holly Springs. It denied the allocation requests for Durham, Fayetteville, and Greensboro. For those requests involving interbasin transfers, namely, Cary, Apex, Morrisville, and Wake County/RTP South, the Commission deferred its decision until those transfer requests could be reviewed under the Interbasin Transfer Statute. The Commission also voted to consider the allocation requests from Chatham County and Harnett County at the same time as the requests requiring an interbasin transfer certificate.

So we have two processes running in parallel: Jordan Lake allocations and interbasin transfer. Interbasin transfers are regulated under the Surface Water Transfers Act. Persons wishing to transfer 2.0 million gallons per day or more must first obtain a transfer certificate from the Environmental Management Commission. In determining whether a certificate should be issue, the Commission must consider a number of factors. These items include:

- The necessity, reasonableness, and beneficial effects of the transfer.
- The detrimental effects on the source and receiving basins, including effects on water supply needs, wastewater assimilation, water quality, fish and wildlife habitat, hydroelectric power generation, navigation, and recreation.
- The cumulative effect existing transfers or water uses in the source basin.
- Reasonable alternatives to the proposed transfer
- Any other facts and circumstances that are reasonably necessary to carry out the purposes of this Part.

Overall, the benefits of the transfer must be found to outweigh the detriments.

A provision of the law requires that an environmental assessment or environmental impact statement be prepared in accordance with the State Environmental Policy Act as support documentation for a transfer petition.

We are, therefore, midway in the approval process. The applicants have completed a draft Environmental Impact Statement. At the conclusion of a 45-day public review period ending July 31st, all oral and written comments received will be incorporated into the Final Environmental Impact Statement. An additional 30-day public review period will follow. The next steps are:

In September, the Division will present recommendations on the interbasin transfer request and Jordan Lake allocations to the EMC - Water Allocation Committee

In October, the full EMC will act on the recommendation to take the transfer and allocation recommendations to public hearing

In November, the EMC will hold a public hearing on the interbasin transfer request and Jordan Lake allocations. Note that this will provide an additional opportunity to comment on this transfer request

In January 2001, the EMC is expected to take final action.

One outcome of this process so far has been the development of a Cape Fear Hydrologic Model to aid decision-making on Jordan Lake issues. The model has been funded with funds from local governments, the State and other stakeholder groups.

That concludes my remarks. I look forward to hearing your comments today.

[Hearing Officer: Tony Young]

Thank you Mark. The next speaker is Bill Kreutzberger with the firm of CH2M Hill. CH2M Hill is the primary consultant for the interbasin transfer request, and prepared the Draft Environmental Impact Statement. Mr. Kreutzberger is going to provide an overview of the applicants' request and results of their environmental analysis. Following Bill Kreutzberger's presentation, I will invite person who have signed up to speak to come forward and present their comments. The first speaker will be John Malzone, followed by Mick Noland.

[Verbal comments of Bill Kreutzberger, CH2M Hill follow]

I have may heard it wrong or Mark may have said it wrong, but the 45-day comment period ends July 31st.

I will go over the Interbasin Transfer Request (IBT) on issues that were summarized in the Environmental Impact Statement (EIS) the final draft. Copies are available through DWR (Division of Water Resources).

I want to briefly touch on the Interbasin Transfer request, how you calculate an Interbasin Transfer, and then go through the environmental review, the scope of the environmental review, environmental alternatives, specific direct impacts of the alternatives, secondary and cumulative impacts, and the conclusion of the environmental review.

The Western Wake communities, RTP South, Apex, Cary and Morrisville have a request to transfer water from the Jordan Lake Subbasin to the Neuse River Subbasin. This is related to the request for additional allocation from Jordan Lake; there is an existing IBT certificate for 16 mgd and the increase is for up to 27 mgd. I will go through how that was calculated.

Just for a little background on the basin. This is the area. You'll see on the left side is Jordan Lake in the Cape Fear or Haw subbasin. The red dashed line is I-40. Cary and Apex are in the middle. There is a pink line that is a little hard to see that shows the basin divide. Portions of Cary and Apex are in both the Cape Fear and Neuse basins. Right now, the existing WWTPs are in the Neuse River basin. Apex is right on the basin divide, probably within ½ or ¼ mile of it. The Cary North and South plants are a little further away. The WTP is shown, and that is in the Cape Fear basin. It pulls water from an intake on Jordan Lake. The study area for the EIS is shown in green and addresses the source basin and receiving basin for the transfer. I'll talk about that in a minute.

In terms of calculating the IBT we need to look at water supply withdrawals, wastewater discharges and other factors to really project the IBT, and in discussions with DWR, the idea was to project the IBT and get a certificate for a relatively long planning period, which was 2030. The Jordan Allocation, the request that is in place, is an allocation request through 2015. That's what DWR decided they would give a 20-year planning request for allocations. The calculation of the IBT is assuming that additional water is received after that within the Cape River Basin through 2030, and there were some demand projections that were used to make those calculations.

Wastewater dischargers I'll go through in a minute, but they include where the existing wastewater is being discharged as well as return of future wastewater to the Cape Fear River

Basin.

The allocation request that Mark went over, Apex and Cary currently have an existing allocation of 16 mgd. That allocation has been used to serve RTP South and Morrisville, in addition to Apex and Cary. The recommended allocation amount is about 25 mgd.

Demand projections were based upon historic per capita water demand with peaking factors, some relatively aggressive assumptions of the water conservation and a progressive water reuse program. The estimated raw water demands on an average basis are a total of 14.3 mgd projected to increase to approximately 30 mgd. The maximum day demands are also shown.

The wastewater discharges are currently into the Neuse River Subbasin, which are currently permitted flows. There are no expansions of those permitted discharges and are considered as a part of the IBT. It is assumed that there will be a proposed regional facility that could discharge up to 40 mgd through the 30-year planning period that would return wastewater to the Haw River Subbasin or downstream of the Haw River Subbasin.

In calculating an IBT, the IBT is a maximum day number. So, it is important when comparing numbers that the IBT is maximum day numbers. Sometimes you see other numbers such as monthly average. So, when comparing flow numbers and flow rates you must recognize they may be calculated on a different duration basis. It considers a withdrawal from Jordan Lake. It also considers consumptive use, that amount of water that may be used for irrigation or other consumptive uses but isn't returned as wastewater, and then the wastewater discharges.

And how much of that is returned to the Cape Fear River Basin so that the difference between that withdrawal and that return is the IBT. The projected IBT amounts are shown to approach 24.1 mgd by the end of the planning period. Again, this is a projection for 30-years so the requested IBT of 27 includes a safety factor of about 10% due to uncertainty in growth projections and the fact that the IBT assumes very aggressive conservation programs which the success of may be a little different in the various communities. The IBT amount in any given year can depend on timing of permits for reuse as well as the Cape Fear Regional Wastewater Treatment Plant.

I guess that all this background on the IBT and the allocation really represents the proposed alternative for the IBT.

Now I would like to go over the Environmental Review and the issues that are addressed in the EIS.

This list of issues are typically shown in an Environmental Assessment (EA) or an EIS. The major issues that were focused on are: Water Quality/Water Resources, particularly hydrologic issues related to the IBT; Wetlands; Fish and Wildlife Resources; Sensitive Species and Habitat. There are also concerns about Urban Land and Forestry Resources and some of the other issues were of lesser concern but are all addressed in the EIS.

We had a number of alternatives that we considered in the EIS. One was the proposed action. Two was related to no increase in the IBT. One included no additional allocation of water from Jordan Lake which would eventually slow growth significantly; the second was no IBT but did assume that there would be more allocation of water from Jordan Lake but the water had to be

returned quicker to the Cape Fear River Basin. Other options were to obtain water from the Neuse, relocating existing wastewater treatment plants, an administrative alternative of merging with the Durham system, and the one that represent the maximum IBT is if there were no regional wastewater treatment plant to return wastewater to the Cape Fear River Basin. How big would that transfer be? There would be a much bigger transfer than 27 mgd and it would be as much as 55 or 57 mgd.

I mentioned before that we are looking at the issues relative to the Source and the Receiving Basin. The Source Basin is the Haw River Subbasin of the Cape Fear River Subbasin. The major issue is the direct hydrologic impacts of the IBT. Both the incremental impacts of the IBT and the cumulative impacts with other uses in the watershed. Another concern was Secondary Impacts of growth in that subbasin. In the Receiving Basin there was a concern about the direct impact of the discharges; however, the existing discharges have all been through environmental reviews. For those discharge amounts there were no increase proposed in those permitted discharges. So those direct impacts have been reviewed as part of other environmental documents. But clearly the Secondary Impacts of growth were major issues that needed to be addressed in the EIS.

For the scope of the Environmental Impact Review we focused on the Direct Impacts. It is important that this is a transfer of water with facilities that are constructed or may require additional environmental approval prior to construction. So there are no construction-related impacts related to this request. So, the direct impacts were hydrologic in nature, and the secondary impacts for almost all the alternatives were the same with the exception of 1A – where there was no IBT and no additional allocation. That one could curtail growth quite a bit. All others would allow growth to occur. Therefore, the Secondary Impacts came down to two alternatives.

Mark mentioned that a hydrologic model has been developed as part of this process and has been used to evaluate direct impacts. The model development was initiated in 1997. It went through a stakeholder group, consultant selection, and then the model development. The Cape Fear River Basin Model is based upon the Danish Hydraulic Institute's Mike Basin Water Resources Model. It has an Arc View Interface for graphically displaying the data, and is based upon looking at daily flows in the Cape Fear River Basin, basically the entire basin above Lock Dam No. 1 near Wilmington's intake and based upon a 65-year period of record.

Now we used that model to evaluate the IBT and a number of factors or indicators to look at impacts. The impacts were Jordan Lake Elevation, Jordan Lake Outflow, Cape Fear River Flow at Lillington, Cape Fear River Flow at Fayetteville, and the Jordan Lake Water Quality Pool Storage. We did all the analyses on the 65-year hydrologic record.

The scenarios that we analyzed for comparison. We looked at the 1998 case, which was a case where it was assumed that the discharges and withdrawals for 1998 were the same for the entire 65-year period of record. Then we also looked at a base future case that assumed full use of the 100 mgd water supply available in Jordan Lake. All assuming that the current rule applies and 50% returns to Jordan Lake and that current allocation holders are using their full allocations.

We looked at the proposed action and then the alternatives in relationship to these. I'm not going to show a lot of graphs but will show two. The first shows the comparison of the incremental impacts on Jordan Lake and basically the left hand axis is the percent of the time the

flow exceeds a certain amount or in this case that the elevation is less than a certain amount. The top graph shows base 1998 and these are all of the others including the base future and proposed alternatives. In other words, it is hard to distinguished between the base future case and all the proposed alternatives. A similar situation in terms of comparison of incremental effects of flows at Fayetteville. Again, this is the percent of time it exceeded this flow at Fayetteville.

From the hydrologic model, the basic conclusion is that the IBT has no significant impact on lake elevations, Jordan Lake outflows or downstream flow frequency. There were some changes; however, the differences that we saw from the 1998 base case are due to full use of the Jordan Lake Water Supply Pool not the proposed IBT which is one of the reasons why we analyzed it that way. There is a summary of this in the EIS proper and a more detailed technical memorandum in Appendix B.

The secondary impacts are concerned with growth in the RTP area, where there is a great job market, good universities, and a lot of livability factors which makes this an attractive place to come. The position of the DENR is the proposed IBT may facilitate growth. Of course there are other projects such as transportation, which may facilitate growth. Because the IBT may facilitate growth, we had to look at the growth impacts.

The potential impacts of growth within the area includes: stream and lake impacts; increased stormwater runoff pollutants; changed hydrology of streams, in particular wetland loss; fragmentation of terrestrial habitats, which is very important to Wildlife Resources staff; air impacts; groundwater impacts; and noise. DENR as part of the Governor's Smart Growth Initiative wanted the applicants to consider mitigation of secondary impacts: issues such as open space and land use plans, growth management plans, riparian area protection, improved erosion sediment control, limitation on floodplain development, and water conservation and reuse.

Conclusions from the Environmental Review in terms of direct impacts of the IBT is that it has no significant impact on lake elevation, Jordan Lake outflows, flow frequency or downstream flows. Again, there are no construction related impacts.

Secondary and cumulative impacts may be significant, and expensive mitigation measures have been included in the EIS to address these issues.

[Hearing Officer: Tony Young]

Thank you Bill. I will now call on those persons who have indicated a desire to comment on the Draft Environmental Impact Statement. Please limit your comments to matters relevant to the proposed interbasin transfer. All speakers must come up to the microphone so that we can pick up your comments on our tape recording. If you have a written statement of your comments, as requested, please give them to the person at the registration table. When your name is called, please step up to the microphone and identify yourself and your affiliation.

We have received a letter from Senator Tony Rand. He requested that it be read into the record, so I will read it at this time.

[Letter from Senator Anthony E. Rand follows]

NORTH CAROLINA GENERAL ASSEMBLY Senator Anthony E. Rand, 24th District

July 13, 2000

Room 300 C Legislative Office Building Raleigh, NC 27601-2808 (919) 733-9892 (919) 733-3113 Fax tonyr@ms.ncga.state.nc.us

Chairman, Rules and Operations of the Senate Chairman, Employee Hospital and Medical Benefits Vice Chairman, Appropriations/Base Budget Vice Chairman, Information Technology

TO BE READ AT THE HEARING THIS EVENING CARY TOWN HALL, 5:00 – 7:00 P.M.

Mr. Tony Young
Hearing Officer
Division of Water Resources
Department of Environment and Natural Resources
Archdale Building
512 North Salisbury Street
Raleigh, North Carolina 27604-1148

Dear Mr. Young

Through my service in the General Assembly and also my service as Chairman of the Cape Fear River Assembly for several years, I have become acutely aware of the problems of water supply and the protection of the Cape Fear River Basin.

The City of Fayetteville has been blessed to be located on the Cape Fear and the founding fathers of our city knew this when they located our city there. Now there are those who would deny us our most valuable resource and take the short term approach to transfer water from our river basin. To allow others to grow at our expense would be shortsighted in the extreme. The City of Fayetteville has voted a significant bond issue in order to return the water it takes from the Cape Fear back to the Cape Fear for further use by those down stream.

We should all be good stewards of our natural resources and should not try to benefit at the expense of the less fortunate. I have no problem with the Triangle using water from the Cape Fear, but I do have significant problems with their failure to return it to where the Lord originally put it.

Detail of the Physics Community of the Section 1.

I appreciate your attention to this and wish you well in your efforts.

Very truly yours,

AER:ec

Anthony E/Rand

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Hearing Officer: Tony Young

The first speaker is John Malzone followed by Nick Noland.

[Verbal comments of C. John Malzone, Fayetteville / Cumberland Chamber of Commerce follow]

Thank you, my name is John Malzone from Fayetteville and I am here on behalf of the citizens of Fayetteville and Cumberland County. More particularly the Fayetteville/Cumberland County Area Chamber of Commerce.

I am a member of the Chamber of Commerce as well as being a member of the Fayetteville Area Economic Development Commission and I remember back in 1988 when the original 16 million gallons were transferred. There was a discussion in Fayetteville but we were busy with other matters. We didn't complain too much and plus it was our good friends up in Cary, by gosh it was a nice little town up in Cary, we were happy to see them grow. But funny things have happened over these past several years and Cary has grown dramatically as has Fayetteville. But the difference is that we are a low wealth community and consequently we do not have the proximity to the state capital, we don't have the highways, the educational resources. But what we do have is the desire to grow because Fayetteville and Cary are kind of alike. Most everybody from Fayetteville is not from Fayetteville and a lot of people from Cary are not from Cary. But what happens is people gravitate to a certain geographic location and we have similar likes and similar desires, we want our community to grow.

What we understand in Fayetteville is that for us to grow successfully we have to have industrial development. For this we have no problem with Wake County and the Triangle Area using water from the Haw Basin/Cape Fear Basin as long as they return it to that basin so that we downstream can use that water. We cannot grow if water is taken from this basin, deposited into the Neuse Basin never to return. So on behalf of the citizens, the 350,000 people in the Greater Fayetteville/Cumberland County Area we urge you to re-examine this Impact Statement. I serve on the Cape Fear Valley Health Systems Board Trustee, two years as its President and a 600 million dollar a year health system and we find that when we want an issue to go our way, we pay the consultants. So consequently consultants are wonderful, they provide a tremendous amount of information but to say that there is no significant impact downstream, I think is an incorrect interpretation of reality.

Thank you.

[Hearing Officer: Tony Young]

Thank you Mr. Malzone. Mick Noland is our next speaker, followed by Elton Hendricks.

[Written copy of verbal comments by Mick Noland, Chief Operating Officer, Public Works Commission, City of Fayetteville follow]

STATEMENT BY FAYETTEVILLE PUBLIC WORKS COMMISSION

JULY 13, 2000 PUBLIC HEARING PROPOSED IBT INCREASE FOR RTP SOUTH AND TOWNS OF CARY, APEX AND MORRISVILLE

My name is Mick Noland. I am the Chief Operating Officer for the Water Resources Division of the City of Fayetteville Public Works Commission. This evening I would like to take a few minutes to describe some of our concerns with the proposed interbasin transfer increase for several communities in the Triangle area. I will confine my remarks to specific areas relevant to the May 2000 Draft EIS that is currently under review.

First, we believe that the Proposed Action should be redefined. The Proposed Action assumes that construction of a regional wastewater treatment plant will occur in western Wake County with discharge to the Cape Fear River. However, we know of no reason that this can be assumed as a given. No environmental review has yet been issued for public review of such a project. We do not believe that it is appropriate to now assume that a West Cary wastewater treatment plant or some other similar project will be permitted. A SEPA review process has not even been conducted and potential construction of such a project is envisioned by Cary as being nearly a decade away.

Alternative 5 is defined assuming that the Cary North, Cary South, and Apex wastewater treatment plants may have sufficient permitted capacity to treat projected wastewater flows to 2030. In fact, the recently adopted Wake County Water & Sewer Plan includes a recommendation that the capacities of both the Cary North and Cary South wastewater treatment plants be expanded in the near future.

Given these facts, we request that the Proposed Action be redefined as Alternative 5, which assumes that no regional wastewater treatment plant is constructed in the Cape Fear Basin.

Second, we believe that the alternative of purchasing water from Raleigh should be reevaluated. Alternative 2 includes purchase of finished water from either Durham or Raleigh. The EIS points out that Raleigh has recently denied Cary's request for additional water purchases through 2003. However, Cary has a connection with the City of Raleigh with a capacity of 13 mgd and, as recently as May of this year, Raleigh did agree to sell additional water to Apex and Wendell. In addition, there have been recent reports that Raleigh could still agree to sell additional water to Cary, particularly if the State approves increasing Raleigh's water treatment plant capacity to 80 mgd. The adopted Wake County Water & Sewer Plan even includes a recommendation that Raleigh's water treatment plant capacity be expanded to 96 mgd by 2003, to 120 mgd by 2011, and to 136 mgd by 2025. To back up this recommendation, Raleigh, less than two months ago, adopted a Capital Improvement Program that allocates 54 million dollars for expanding Raleigh's water treatment capacity.

Given these facts, we request that the availability and feasibility of purchasing water from Raleigh be reevaluated in light of adopted plans to greatly expand Raleigh's water treatment capacity.

Third, we do not believe that the EIS scenarios provide a realistic tow flow impact assessment for users downstream of Jordan Lake. The Base 1998 scenario is supposed to represent existing basin conditions in 1998. However, Cape Fear River flows at Lillington simulated in the EIS are frequently much higher than actually occurred during the period since Jordan Lake filling was completed in 1982. The fact is that actual Lillington flows have dropped below the 600 cfs minimum flow target every year between 1982 and 2000, often far below 600 cfs, and to levels as low as 300 cfs. In other words, the impact

assessment of downstream flow conditions is theoretical rather than a realistic assessment of what downstream users can expect. The low flow periods where large flow discrepancies exist between actual and simulated levels are the same periods that are critical for evaluating the impact on downstream communities such as Fayetteville.

Given these facts, we request that a realistic evaluation of low flow impacts below Jordan Lake be developed for the EIS.

Fourth, we believe that the EIS scenarios demonstrate that the Jordan Lake water quality pool is already insufficient for downstream needs. Even under the Base 1998 scenario, simulated Jordan Lake water quality storage is fully depleted so frequently that it is clear that the water quality pool is too small to maintain the 600 cfs minimum flow target at Lillington. This demonstrates a critical problem in how current Jordan Lake storage is currently managed. We believe that it would make more sense to first ensure that adequate storage can be apportioned to maintain downstream flow needs before allocating additional water supply storage. Otherwise, downstream users such as Fayetteville, who depend on Jordan Lake water quality storage to maintain the minimum flow target, can already expect insufficient Cape Fear flows during drought. This expectation is confirmed in the Base 1998 scenario results from the EIS showing Lillington flows dropping down to about 100 cfs or less during one out of every seven years. The EIS claims that the Proposed Action will not affect downstream users' supplies or assimilative capacities. However, the EIS misses the point that the data show that there is already a problem with the water quality pool maintaining an adequate low flow regime.

Given these facts, we question the logic of approving new allocations when, even under existing conditions, downstream users already face such critical supply uncertainties.

Fifth, we believe that the EIS scenarios demonstrate that the current Jordan Lake water supply safe yield estimate is questionable. The Proposed Incremental scenario assumes that total Jordan Lake withdrawals equal 100 mgd. Under this scenario, simulated Jordan Lake water supply storage is fully depleted in 1933, 1934, 1953 and 1954 and nearly depleted in 1986. We question the legitimacy of the 100 mgd safe yield estimate for Jordan Lake when these EIS results show water supply storage being fully depleted in multiple droughts and fully depleted or at less than 5 percent for over three consecutive months in one drought. At the very least, these results demonstrate that the 100 mgd estimate may be optimistically high. This is even before considering the potential safe yield reduction if the "50 Percent Rule" were modified to allow a greater than 50 percent diversion of the water supply pool out of Jordan Lake's watershed.

Given these facts, we question the prudence of approving new allocations when this level of uncertainty exists with this most basic assumption of available safe yield for allocation.

Sixth, we do not believe that the acceptability of cumulative impacts has been assessed. The EIS does include scenarios in which the complete Jordan Lake water supply pool is utilized. However, the real question, of whether the cumulative impacts are acceptable or not, is not addressed in the EIS.

Lastly, we wish to emphasize that an objective evaluation of the EIS is needed regardless of the construction already underway to make use of the proposed allocation. Cary/Apex water supply system improvements are already well underway that would allow withdrawal and treatment of an expanded Jordan Lake allocation. These improvements include expansion of the water treatment plant, expansion of the raw water pump station, and construction of a raw water transmission line. Millions of dollars have already been spent on this

construction which began last year in October. These improvements have been made without EMC approvals and constitute a sizable risk

Given these facts, it's critical that the EIS be objectively evaluated even though millions of dollars have already been spent on construction.

In closing, let me just add that we now have the opportunity to take a positive step toward ensuring that the Cape Fear River remains available for the present and future generations who will have to rely on this resource. The serious warning signs that already exist in this basin should cause all of us to stop and make sure that these issues are addressed now, while the opportunity still exists, and before irreversible actions are taken. We merely need to look at the water quality issues in the adjacent Neuse River Basin to see how serious problems can easily overtake us if we don't take full account of the warning signs. A more pro-active approach to management of our basin would ultimately be in everyone's best interests rather than allowing expediency to govern our actions.

Thank you for the opportunity to express the views of the City of Fayetteville Public Works Commission. We respectfully ask that each of our concerns be satisfactorily addressed before any final decisions are made concerning the requested IBT.

Respectfully submitted by:

M. Moland, P.E.

Chief Operating Officer

Water Resources Division

City of Fayetteville Public Works Commission

[Hearing Officer: Tony Young]

Thank you Mr. Noland for your comments. The last speaker who has signed up is Elton Hendricks.

[Verbal comments of Elton Hendricks, President, Methodist College, Fayetteville, NC follow]

Ladies and Gentlemen, I appreciate the opportunity to speak with you briefly on a very important topic.

My name is Elton Hendricks; I am the President of Methodist College in Fayetteville. We are in the northern part of the City of Fayetteville; our campus is aligned or situated along the Cape Fear River. We have approximately 1-mile footage along the Cape Fear so it is the river I have a privilege of looking at regularly and happy to see it flow along happily and constantly.

I am concerned that the IBT threatens the water source of the City of Fayetteville. It threatens the future economic development of an area that needs economic development, and the IBT threatened the quality of life in the Cumberland County/City of Fayetteville area. I am not convinced from what I've known earlier or what I have heard today that the environmental questions surrounding the IBT have been adequately addressed. For example, the Executive Summary reads in part that the EIS includes Direct Impacts of the IBT would be insignificant and yet we've heard here today the acknowledgement that assessments about reduced use and conservation were very aggressive assumption with regard to IBT. Then the assumption, the environmental impact would be insignificant based on the assumption of additional wastewater treatment plants to return water to the Cape Fear Region. Those are at least in the present environment far from certain and do not justify confidence that the EIS would be valid. It is instructive to remember what we were told by the tobacco industry for a long period of time that there were really no questions of health regarding the tobacco industry. Those in fact are not the case.

There is obviously a need and desire that the growth of the Research Triangle Area to continue for the use of water but a simple conclusion on my part is that if you want to use the water from the Cape Fear Region put it back in the Cape Fear River Basin. One of the basic things we learned in kindergarten was if you used something, you should put it back where you found it. That is true, whether it is a cookie cutter for play dough or whether it is water from the Cape Fear River Basin. If the water is needed it should be used, treated, and placed back into the river from which it came. The river that nature and nature's God placed in that particular location; it is inappropriate to divert water from the Cape Fear Basin for the welfare of rapidly growing areas elsewhere when those who live downstream need that water for their own economic development.

Now there are two objections that I have heard to the question of treatment and replacing of the water in the Cape Fear Basin. One is that the treatment plants are not ready and unlikely to be ready anytime in the near future. The Fayetteville Observer today has a wonderful editorial entitled "Water Heist" justly note to Cape Fear holdup suggest that the current projection of our water treatment plant projected for the year 2003 which itself was a postponement from and earlier date. The editorial raises serious questions if that water treatment plant would be available by that time. But the fact that the water treatment plant, water treatment is not available and the result to that should not be borne by people who live downstream. Those who

live downstream should not be required to bare the burden of poor planning upstream. If water is to be taken from the Cape Fear those people who needed should make adequate plans for treating it and returning it to the Cape Fear Basin.

The second argument that I have heard about returning it to the Cape Fear Basin is that it is just too expensive. But my conclusion is that if you need water or need somebody else's water you should be willing to pay for it.

The tax base of the Research Triangle, Wake County, Raleigh, and Cary area is the envy of most communities in the nation, a large tax base. If there is anyone who can afford to pay for water treatment facilities are those people who live in this particular area. It is never just and moral to ask poor counties downstream to bare the burden of rich counties upstream and that's what in fact is being done or being proposed when it is suggested that we have IBT to the benefit of wealthy counties to the detriment of poor counties downstream.

I think the conclusion is simple, if you need the water take it, use it, treat it, and put it back; recognizing that there is some consumptive degradation in the amount of water that is returned. That is understandable. But no water should be taken out of the Cape Fear beyond what has already been taken until adequate preparations are made to return that water. That is the politically responsible, environmentally responsible, and the morally responsible thing to do.

And then one last comment. Those people who would be most damaged by transfer from the Cape Fear Basin to the Neuse Basin, those who would have the most detrimental experience from that activity don't live in the area where this hearing has been held. This hearing ought to be held in the region where the people downstream will experience that and I suggest that any future hearings ought to be held in an area which is convenient to the people who would be most damaged by the transfer.

I appreciate the opportunity to express these views and I have every confidence in the wisdom and the responsibility of the environmental folks in our state that in the end we will do the environmentally, politically, and morally responsible thing to do.

Thank you very much.

[Hearing Officer: Tony Young]

Thank you Mr. Hendricks for your comments. Are there any additional comments from anyone at this time? For persons wishing to comment later, the record will remain open for written comments until July 31, 2000. Instructions for submitting comments are printed on the public notice. Written comments will be considered equally with oral comments. All comments will become part of the permanent public record and will be included in the Final EIS. Thank you for your interest in the management of North Carolina's water resources and for your participation in today's public hearing. The hearing is now closed.